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OF EDUCATION

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RESEARCH IN THE SOCIOLOGY OF
EDUCATION VOLUME 20

**RESEARCH IN THE
SOCIOLOGY OF
EDUCATION**

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CONTENTS

<i>About the Authors</i>	vii
Educational Outcomes of Heterogeneous Groups of Students in Diverse Contexts <i>Hyunjoon Park and Grace Kao</i>	1
The Variation in Educational Aspirations among Immigrant Students in Germany <i>Taylan Acar</i>	5
School Violence in China: A Multilevel Analysis of Student Victimization in Rural Middle Schools <i>Jennifer Adams and Emily Hannum</i>	41
Global Patterns of the Use of Shadow Education: Student, Family, and National Influences <i>Soo-yong Byun, Hee Jin Chung and David P. Baker</i>	71
Narratives of Interdependence and Independence: The Role of Social Class and Family Relationships in Where High-Achieving Students Apply to College <i>Yang Lor</i>	107
Jumping on the STEM Train: Differences in Key Milestones in the STEM Pipeline between Children of Immigrants and Natives in the United States <i>Yingyi Ma and Amy Lutz</i>	129
Socialization Experiences and Research Productivity of Asians and Pacific Islanders: “Model Minority” Stereotype and Domestic vs. International Comparison <i>Josipa Roksa, Soojeong Jeong, David Feldon and Michelle Maher</i>	155

**Gender Gaps in Student Academic Achievement and
Inequality***Shu-Ling Tsai, Michael L. Smith and
Robert M. Hauser*

181

Index

219

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EDUCATIONAL OUTCOMES OF HETEROGENEOUS GROUPS OF STUDENTS IN DIVERSE CONTEXTS

Hyunjoon Park and Grace Kao

The journal, *Research in the Sociology of Education* (**RSE**) has long highlighted how societal contexts matter in shaping the educational experiences and outcomes of individual children and youth by publishing sociological studies of education across a wide range of societies. Even a simple glance at titles of some previous volumes – such as *Globalization, Changing Demographics, and Educational Challenges in East Asia* (Vol. 17) and *Children’s Lives and Schooling across Societies* (Vol. 15), makes this point clear. This new volume of **RSE** (Vol. 20) continues this tradition by publishing five single-country studies of educational issues in diverse settings such as rural China, Germany, and the United States (three papers) as well as two comparative studies (one comparing students across three East Asian and three Western societies; one dealing with large-scale international data from 64 countries). Readers of a specific society will find that educational issues such as student victimization at school (Adams and Hannum), immigrant-native gaps (Acar, and Ma and Lutz), gender gaps in academic performance (Tsai, Smith, and Hauser), and participation in academically oriented after-school supplementary education (often called “shadow education”) (Byun, Chung, and Baker) are not limited only to their own societies but are also relevant in a global context.

However, studies included in this volume also highlight the distinctive nature of the issues that are contingent upon specific national and regional contexts. Cross-national comparisons by Tsai et al. and Byun et al. show significant variation across countries in the relationships between determinants and an educational outcome of their interest. Single-country studies by Acar (Germany) and

Adams and Hannum (rural China) also discuss how their findings are not only consistent but also deviate from those of existing studies, requiring detailed knowledge of local contexts to understand the unique patterns. Three studies of US students (Lor, Ma and Lutz, and Roksa et al.) are good examples demonstrating how firm grasp of local contexts can help formulate interesting research questions and discover important sources of disparities in educational outcomes that pertain to the specific setting of US education. In summary, readers can see simultaneously commonality and uniqueness of educational issues in a global perspective.

In addition to diverse settings under which specific educational issues are situated, another distinctive feature of the current *RSE* volume is its coverage of studies that look into a variety of educational outcomes. Readers can find studies that deal with such diverse issues as gender gaps in test scores (Tsai et al.), educational aspiration (Acar), student victimization (Adams and Hannum), shadow education participation (Byun et al.), college application (Lor), college majors and completion in STEM (science, technology, engineering, and mathematics) fields (Ma and Lutz), and socialization and research productivity of doctoral students in biology (Roksa et al.). As a whole, our *RSE* volume illustrates how the current scholarship in the field of sociology of education is rich and comprehensive in its inquiry of various educational issues in contemporary societies.

Finally, in our *RSE* volume readers will also learn about how diverse groups of students are examined across several dimensions of social categories. In addressing disparities in educational outcomes, some studies in our volume address how female vs. male students (Tsai et al.) and students from different socioeconomic background (Lor) face different educational experiences and outcomes. Others are interested in relevance of students' immigrant status (Acar, and Ma and Lutz) and international student status (vs. domestic) (Roksa et al.) in shaping student's educational experiences and outcomes. In addition to these individual factors, Adams and Hannum and Byun et al. highlight importance of classroom and national characteristics, respectively, in affecting students' experiences in schools and outside of schools.

As always, this collection of seven papers would not be possible without many colleagues' invaluable time and efforts to read the manuscripts and to provide useful comments and suggestions. We are fortunate to have such a collegial community of scholars in the field of sociology of education who do not mind going through the submitted manuscripts despite their many competing responsibilities. We sincerely thank our reviewers – we know that the authors of the papers contained in this volume have greatly benefitted from their comments. Of course, we are grateful to all the authors who contributed to our volume. The authors' persistent efforts to incorporate reviewers' and editors' suggestions have made their studies even stronger. Obviously, we could not accept all the papers submitted. We thank those authors who offered an opportunity for reviewers and editors to read their interesting papers. We, editors, believe that the best way for us to pay back to all the reviewers and authors is to help audience get access to such interesting and

important studies collected in this volume, and to promote lively discussion about various pressing issues in education for the sociology of education community. Now it is time for readers to evaluate the contribution of our seven papers to the literature in sociology of education. Finally, Sangsoo Lee in the Department of Sociology at the University of Pennsylvania generously provided help to the editors and we also thank our publisher Emerald for the support given to us in the publication process.

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THE VARIATION IN EDUCATIONAL ASPIRATIONS AMONG IMMIGRANT STUDENTS IN GERMANY¹

Taylan Acar

ABSTRACT

This study examines the educational aspirations of immigrant students, who are descendants of eight different immigrant communities in Germany. First, the article shows that compared to native German students, the educational aspirations of students with migration origin vary substantially. Challenging previous narratives of immigrant optimism and information deficit, the article suggests that the students of Turkish origin develop a conscious appraisal of obtaining an academic high-school qualification (AHSQ), even if they realize they will not be able to receive one by the end of the high-school. The study also shows that the duration of their stay in Germany plays a significant role in attenuating the high educational aspirations of most immigrant communities. However, Turkish students constitute an exception to this finding as they maintain high idealistic aspirations from first- to third-generation. The return migrant students from the former Soviet Union are the only group who report high educational aspirations, when asked about both their idealistic and realistic aspirations. Finally, the findings indicate that the position of the particular immigrant groups within the German social status hierarchy is a strong determinant of the educational aspirations of immigrant students and their parents.

Keywords: Educational aspirations; immigrant education; educational inequality; immigrant optimism; generation status; Germany

INTRODUCTION

Descendants of immigrants today constitute an increasingly large section of the school-age population in Germany. Even if the two large waves of migration – the labor migration and the post-Cold War repatriation of immigrants from the former Soviet Union (FSU) – are now issues of the past, the size of the young and young adult population in Germany is at its zenith. According to the last census report, the total immigrant population is 19% of the entire German population (Tarelli, Bos, & Bremerich-Vos, 2012). Yet the report reveals that 32% of the German population under the age of 15 and 29% under the age of 25 have an immigration background; whereas, only 8% of those who are 65 and older have a migration background (Statistisches Bundesamt, 2011). Today, the “population with migration background”² in Germany is more diverse than ever with the increasing numbers of immigrants coming from the Middle East, Africa and different parts of Asia.

The educational aspirations received close scholarly attention since Sewell and his colleagues articulated measures of educational and occupational aspirations and influence from significant others with Blau and Duncan’s (1967) original model of the intergenerational attainment process (Sewell, Haller, & Ohlendorf, 1970; Sewell, Haller, & Portes, 1969). Sewell and his collaborators adopt the temporal ordering of events in the earlier model, which examined the variation in educational and occupational attainment in a population (Grodsky & Jackson, 2009, p. 2360). However, their Wisconsin model of status attainment further integrates educational and occupational aspirations as mechanisms affected by students’ socioeconomic status and mental ability, determining the eventual educational and occupational attainment.

Prior research shows that minority and immigrant students hold higher levels of educational aspirations than their native born and white counterparts in the United States (Glick & White, 2004; Kao & Tienda, 1995, 1998; Mickelson, 1990; Rosenbaum & Rochford, 2008), as well as in Germany (Becker & Gresch, 2016; Ditton, Krüsken, & Schauenberg, 2005; Roth & Salikutluk, 2012; Salikutluk, 2016; Schuchart & Maaz, 2007). Cross-national research reveals similar high aspirations among migrant students in comparison to majority and native peers, once the models control for social origins of students (Stanat, Segeritz, & Christensen, 2010).³ Thus, among immigrants, socioeconomic resources in the family are likely to be weaker determinants of educational aspirations (cf. Sewell et al., 1969, 1970). This might be because immigrants tend to overestimate the available opportunities for educational and occupational attainment in the destination country context (Nauck, Diefenbach, & Petri, 1998).

This study uses data drawn from the German National Educational Panel Study (NEPS), which provides measures for realistic and idealistic educational aspirations of a nationally representative sample of ninth graders in Germany (Blossfeld, Roßbach, & von Maurice, 2011). Based on the differentiation between realistic and idealistic aspirations, I offer an alternative explanation to the aspiration–achievement paradox of immigrant students, especially among

those of Turkish origin. Challenging the previous theoretical explanations, I suggest that Turkish immigrant students are not excessively optimistic about their potential educational attainment. Nor they suffer from an information deficit about the German secondary schooling, which arguably leads them to overestimate their future educational attainment. In fact, their high idealistic educational aspirations and low realistic educational aspirations for obtaining an academic high-school qualification (AHSQ-prerequisite for attending college or universities of applied sciences), indicates that, by ninth grade, they are mostly aware of the fact that they are not going to receive an AHSQ by the end of high-school; yet they still strive for one.

The objectives of this study are threefold. First, by differentiating between the idealistic and realistic educational aspirations, I offer an alternative explanation for the high aspirations among immigrant students, which challenges the previous theoretical understanding of immigrant optimism and information deficit. Second, relying on a relative large sample of immigrant students, I examine whether educational aspirations vary by immigrant group and how generation status influences the aspiration levels among immigrant communities. Generational change is an important mechanism contributing to the resemblance of immigrant children to their native German peers. However, there are relatively few studies, which directly measure the effect of generational change on educational attitudes and behaviors of immigrant children and parents (see [Greenman, 2013](#); [Stanat et al., 2010](#)). Finally, I estimate whether the aspirations of ninth grade students and their perception of their parents' aspirations differ considering the realism that early school tracking in the highly differentiated German secondary education system imposes on students.

THEORETICAL FRAMEWORK

The aim of this study is to examine how eight immigrant groups in Germany differ from each other, as well as from their native German peers in terms of educational aspirations, and discuss whether educational aspirations hold the same significance for each immigrant group ([Kao & Tienda, 1998](#), p. 375). It builds on previous research by examining the interplay among the factors that influence the formation of educational aspirations and experiences of immigrant youth from different countries of origin.

Educational aspirations and educational achievement of immigrant youth is closely linked to the position of the particular immigrant family and immigrant community in the social status hierarchy. The social and historical conditions of arrival in Germany determine the human and economic capital of immigrant families. Labor and nonlabor migrant populations in Germany differ from each other in terms of the opportunities available following their arrival, their particular cultural and demographic characteristics, as well as the discrepancy between Germany and the countries of origin in terms of educational opportunities ([Diehl & Schnell, 2006](#); [Portes & Rumbaut, 2001](#); [Schulz & Leszczensky, 2015](#); [Segeritz, Walter, & Stanat 2010](#)).

Scholars also showed that if immigrant communities originate from countries where the rates of enrollment in tertiary education and opportunities for college attendance are low, communities from these countries might interpret their migration as an improvement in their educational opportunities in the German context (Relikowski, Yilmaz, & Blossfeld, 2012).

Formation of Educational Aspirations among Immigrant Families

Previously, scholars argued that aspirations of significant others (Sewell et al., 1969, 1970) or the motivation to attain parents' social status (Breen & Goldthorpe, 1997; Erikson & Jonsson, 1996; Stocké, 2013) determine educational and occupational aspirations of students. Differences in aspirations should reflect parents' educational and occupational status, leading to high educational ambitions of students from privileged social backgrounds and vice versa. High educational aspirations among immigrant groups, however, indicate that socioeconomic origin is not a strong determinant of educational aspirations, which challenges the theoretical premises of intergenerational status attainment models as well as the claims of rational choice approaches.

High educational aspirations among immigrant parents and students manifest despite (or perhaps because of) their low educational levels of achievement. Previously, scholars identify this discrepancy between the high educational aspirations of immigrant families and the relatively low educational performance of immigrant children as "the aspiration-achievement paradox" (see Becker, 2010, p. 1; Kao & Tienda, 1998, p. 379; Mickelson, 1990, p. 44). In Germany, there is compelling evidence for the coexistence of high educational aspirations with low educational achievement among immigrant students, especially among the migrant population from Turkey (Becker, 2010; Kristen & Dollmann, 2010; Nauck et al., 1998; Relikowski et al., 2012). Previous research also shows that the return migrants from the FSU have higher educational aspirations than their native German peers, yet not as high as those of Turkish origin (see Becker, 2010; Salikutluk, 2016). There is limited information about the levels of aspirations for other immigrant groups (Stanat et al., 2010) as immigrant groups from Turkey and from the FSU have so far received particular attention from migration scholars.

Education and migration researchers formulated three theoretical mechanisms to explain the high educational and occupational aspirations of immigrant parents and their children (cf. Kao & Tienda, 1995, 1998): immigrant optimism, information deficit and the blocked opportunities framework. Scholars also examine the influence of significant others such as parents and friends, formulated originally in the Wisconsin model of status attainment. However, I argue that the influence of significant others does not constitute a separate mechanism, as this influence might appear in different kinds of mechanisms including the three that I identified above. The influence might also be in the form of lack of positive role models (Ogbu, 1991), negative influence of peer networks (Suarez-Orozco, 1991), and high levels of social capital, which generates positive attitudes toward education and middle-class values (Roth & Salikutluk, 2012).

The characteristic misinterpretation of available opportunities is called “immigrant optimism,” defined as the development of high expectations after arrival in a new country. New immigrants expect the destination context to provide greater potential for successive generations (Heath & Brinbaum, 2007; Kao & Tienda, 1995; Stanat et al., 2010). Immigrant optimism provides a useful framework for understanding the variation in educational aspiration levels among immigrant students of different countries of origin, who form aspirations based on how they interpret the stratified opportunity structures Germany makes available to them considering their own academic opportunities (Grodsky & Jackson, 2009, p. 2362).

Previous work on second-generation immigrants in Germany shows that immigrant optimism indeed operates differently among immigrant communities. Using data from 2000 PISA Study, Becker shows that compared to German parents, Turkish parents are 46 times more likely to want their children to complete the academic high-school track, after controlling students’ reading achievements and the socioeconomic status of the family (Becker, 2010, Figure 1), whereas parents with the FSU backgrounds are five times more likely to do so. Based on the 2003 PISA Study, Stanat et al. (2010, p. 54) similarly show that 15-year-olds with Turkish backgrounds have the highest aspiration levels for attaining a tertiary education degree of any group when compared to their native German peers. Their immigrant optimism hypothesis is supported for all immigrant groups in the study – including the FSU, Polish students, and a group composed of those from all other countries of origin (cf. Salikutluk, 2016).⁴ A qualitative case study with parents of Turkish immigrants in federal states of Bavaria and Hesse shows that moving to Germany increases hopes for a better future for subsequent generations and boosts immigrant families’ aspirations for their children (Relikowski et al., 2012).

Second, Kao and Tienda (1998) find that black and Hispanic youth in United States lack information about college and admission procedures, exacerbated for black youth by social segregation in schools. This finding is later formulated as the *information deficit* explanation that among immigrant families, the lack of familiarity with the destination country’s educational system generates biased perceptions about the potential educational attainment of immigrant students. In the German context, besides optimism, Turkish parents also reveal informational deficits due to their limited familiarity with the German educational system (Relikowski et al., 2012, pp. 117–118). Zielonka and his associates find that accepting schools and teachers as the sole authority over their children’s education is especially common among families with Turkish backgrounds (Zielonka et al., 2013). Interviews with Turkish parents show that once their children go to school, they delegate their responsibilities about schooling to institutional actors, similar to Laureau’s (2003, p. 3) findings among American working-class families (2003, p. 3).

If immigrant optimism and information deficit hypotheses hold, then one should expect their role to attenuate over time as the immigrant groups’ duration of stay in the destination context increases. Thus, generation status should be a key factor in alleviating the optimism about and the unfamiliarity with

available opportunities in the destination country context (Greenman, 2013). For example, optimism of immigrant communities might disappear over time, after they face the realities of the destination society. The findings of Stanat et al. (2010, p. 53) from 13 destination countries confirm that high aspirations weaken between first- and second-generation students from the same countries of origin. The generation status of immigrant students should illustrate whether longer duration of stay in the destination context is relevant for explaining the “adjustment process”; the accommodation of aspirations to meet the social conditions of the German context (Becker & Gresch, 2016, p. 79), possibly widening the gap between educational aspirations of recent and older immigrant families.

The third explanation for the high educational aspirations among immigrant families comes from the blocked opportunities framework. Kao and Tienda (1998, p. 353) argue that blocked opportunities, in the form of social and structural barriers to educational and occupational success, leads to two distinct reactions among immigrant communities. Students either overachieve academically against the odds of discrimination and limited opportunities due to their minority status, or a minority or ethnic group abandons hope and effort for scholastic achievement because they “become skeptical about the value of educational success as a means to upward mobility” (Kao & Tienda, 1998, p. 353). The latter variant focused on emergence of oppositional cultures among the black and Hispanic youth, who lose expectations for educational and economic success (Fordham & Ogbu, 1986; Ogbu, 1991). The former view mainly find evidence among Asian children that parental educational aspirations are especially high among Asian parents who anticipate occupational discrimination for their children and transmit to their children the idea of the worthiness of educational success (Kao, 1995; Pearce, 2006; Sue & Okazaki, 1990).

To my knowledge, the blocked opportunities framework has been rarely applied to explain the aspiration–achievement paradox in the European context. Recently, Salikutluk (2016) used an indirect measure to estimate the role of blocked opportunities in migrants’ aspirations and found limited support for it. Previously, Teney, Devleeshouwer, and Hanquinet (2013) found that perceived discrimination in the labor market does not explain the high aspirations among minority groups in Brussels, but personal experiences of discrimination in school has strong associations with high aspirations.

School Tracking and Aspirations

In Germany, the highly differentiated secondary school system should play a key role in the formation of educational aspirations. Students with migration backgrounds are overwhelmingly placed in the lowest secondary school track, which denies them opportunities to access higher education later in their educational careers (Buchmann & Park, 2009; Diefenbach, 2008).

Once the initial track placement at the transition to lower secondary school takes place, only 21% of students with parents with low educational attainments – a category to which immigrant students overwhelmingly belong – are able to enter the academic track, which leads to an *Abitur* degree

for college entrance (Hillmert & Jacob, 2010, p. 69).⁵ The combined effect of socioeconomic disadvantages and immigration background reproduces the inequality immigrant children face in this highly differentiated secondary education system. In the long run, this system serves as a major obstacle for the social mobility of the majority of immigrant youth in Germany (Buchmann & Park, 2009; Maaz, Trautwein, Lüdtke, & Baumert, 2008).

Recent census data reveal that immigrant students disproportionately attend the lowest secondary school type: among immigrant youth who are enrolled in a secondary school, 40% attend a *Hauptschule*, whereas only 23% of them attend an academic – *Gymnasium* – school track (*Statistisches Bundesamt*, 2011). The NEPS ninth grade sample, I use in this study, confirms this uneven distribution of track placement between immigrant and native students; however, it also reveals a great variation among immigrant groups as well (see Table 1).

The key point about the early curricular tracking at the end of the fourth grade (Stocké, 2007) and the highly differentiated secondary education system (Allmendinger, 1989, p. 236; Blossfeld, 1990, p. 169) is that the system would impart “a dose of realism into [immigrant students’ educational] expectations” (Buchmann & Park, 2009, p. 246).⁶ The tracking system in the German secondary education “gives an unambiguous indication of what educational expectations [students] should hold” (Parker, Jerrim, Schoon, & Marsh, 2016; 8). Once students are sorted into differentiated secondary school tracks, students with migration backgrounds might “develop a realistic view of credentials they will obtain” (Buchmann & Park, 2009, p. 248). Therefore, in the presence of a highly differentiated secondary school system, students who attend the lowest (*Hauptschule*) and intermediate (*Realschule*) school tracks should not realistically expect to attend college, unless they manage to pursue an academic qualification after graduation, which is very rare in the German system (Hillmert & Jacob, 2010).

In this picture, it is also important to differentiate educational aspirations of parents and students. Unlike their children, immigrant parents are less likely to have the first-hand experience of attending a German school and incorporate the sense of realism of the highly differentiated secondary school system in Germany. Thus, I expect immigrant students’ aspirations more likely to reflect their secondary school tracks while their parents would maintain high expectations for their future academic success. After taking the secondary school track in to consideration, the mismatch between academic standing and educational aspirations should be higher for parents’ aspirations, but largely disappear for students’ own realistic aspirations.

Arrival Context and Available Opportunity Structures

Given the specific histories of immigration and available opportunity structures after immigration, immigrant groups develop different expectations (Becker & Gresch, 2016, p. 110). These opportunity structures vary by selection into immigration and it varies among groups – some of which are labor migrants, some return migrants, some highly educated, professional European immigrants.

Table 1. School Type, Socioeconomic Origins & Control Variables by Immigrant Group.

	Native German (10,040)	Turkey (847)	Southern Europe (471)	Former Yugoslavia (416)	Poland (446)	Former Soviet Union (719)	North. & Western Europe (448)	Eastern Europe (366)	Asia (369)	TOTAL (13,793)
Secondary School Type										
<i>Hauptschule</i> (Lowest Track)	2,044 (20%)	409 (48%)	192 (41%)	165 (40%)	93 (21%)	293 (41%)	98 (20%)	79 (22%)	109 (30%)	3,482 (25%)
<i>Realschule</i> (Intermediate)	2,200 (22%)	152 (18%)	93 (20%)	90 (22%)	99 (22%)	170 (24%)	93 (19%)	93 (25%)	58 (16%)	3,048 (22%)
<i>Gymnasium</i> (Academic)	3,820 (38%)	146 (17%)	116 (25%)	99 (24%)	137 (31%)	145 (20%)	223 (46%)	146 (40%)	132 (36%)	4,964 (35%)
Other School Type	1,976 (20%)	140 (17%)	70 (15%)	62 (15%)	117 (26%)	111 (15%)	74 (15%)	48 (13%)	70 (19%)	2,668 (19%)
Mother's Educational Attainment										
No Qualification	144 (1%)	216 (26%)	30 (6%)	40 (10%)	11 (3%)	13 (2%)	7 (1%)	6 (2%)	49 (13%)	516 (4%)
Elementary School	1,821 (18%)	271 (32%)	108 (23%)	103 (25%)	64 (14%)	81 (11%)	72 (15%)	49 (13%)	34 (9%)	2,603 (18%)
Intermediate High-School	4,758 (47%)	271 (27%)	211 (45%)	154 (37%)	167 (37%)	305 (42%)	177 (36%)	159 (43%)	110 (30%)	6,273 (44%)
Academic High-School	2,002 (20%)	58 (7%)	73 (16%)	59 (14%)	115 (26%)	141 (20%)	146 (30%)	88 (24%)	71 (19%)	2,753 (19%)
Tertiary Education	1,174 (12%)	33 (4%)	36 (8%)	38 (9%)	69 (16%)	127 (18%)	75 (15%)	53 (15%)	57 (16%)	1,662 (12%)
Other Education	115 (1%)	34 (4%)	13 (3%)	17 (4%)	17 (4%)	48 (7%)	8 (2%)	9 (3%)	37 (10%)	298 (2%)

Parental Occupational Status

Upper Professionals	2,675 (27%)	96 (11%)	111 (24%)	69 (17%)	81 (18%)	99 (14%)	161 (33%)	114 (31%)	94 (26%)	3,500 (25%)
Lower Professionals	2,930 (29%)	156 (18%)	115 (24%)	82 (20%)	116 (26%)	147 (21%)	163 (33%)	94 (26%)	77 (21%)	3,880 (27%)
Routine Non-Manual	3,165 (32%)	266 (31%)	143 (30%)	119 (29%)	174 (39%)	221 (31%)	116 (24%)	110 (30%)	111 (30%)	4,425 (31%)
Skilled Manual W.	786 (8%)	193 (23%)	64 (14%)	84 (20%)	49 (11%)	138 (19%)	35 (7%)	36 (10%)	50 (14%)	1,435 (10%)
Semi- & Unskilled W.	464 (5%)	130 (15%)	38 (8%)	56 (14%)	26 (6%)	112 (16%)	13 (3%)	12 (3%)	29 (8%)	880 (6%)

Number of Books Available at Home

None/ Very few (0–10)	599 (6%)	141 (17%)	57 (12%)	78 (19%)	40 (9%)	82 (11%)	23 (5%)	27 (7%)	64 (17%)	1,111 (8%)
Fill one shelf (11–25)	952 (10%)	212 (25%)	74 (16%)	94 (23%)	75 (17%)	143 (20%)	37 (8%)	45 (12%)	82 (22%)	1,714 (12%)
Fill several shelves (26–100)	2,157 (22%)	261 (31%)	115 (24%)	92 (22%)	124 (28%)	234 (33%)	90 (18%)	59 (16%)	83 (23%)	3,215 (23%)
Fill small set of shelves (101–200)	2,204 (22%)	136 (16%)	87 (19%)	74 (18%)	93 (21%)	137 (19%)	108 (22%)	69 (19%)	62 (17%)	2,970 (21%)
Fill large set of shelves (201–500)	2,626 (23%)	66 (8%)	84 (18%)	49 (12%)	73 (16%)	76 (11%)	120 (25%)	92 (25%)	46 (13%)	2,868 (20%)
Fill shelf units (500+)	1,653 (17%)	30 (4%)	54 (12%)	28 (7%)	41 (9%)	47 (7%)	110 (23%)	74 (20%)	32 (9%)	2,069 (15%)

Anticipated Discrimination (Students who answered “yes” or “rather yes”)

School Type (<i>Hauptschule</i>)	6,843 (68%)	553 (65%)	311 (66%)	281 (68%)	287 (64%)	479 (67%)	355 (73%)	256 (70%)	248 (67%)	9,593 (68%)
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Table 1. (Continued)

	Native German (10,040)	Turkey (847)	Southern Europe (471)	Former Yugoslavia (416)	Poland (446)	Former Soviet Union (719)	North. & Western Europe (448)	Eastern Europe (366)	Asia (369)	TOTAL (13,793)
Language Skills	7,265 (72%)	613 (72%)	315 (67%)	317 (76%)	311 (70%)	512 (71%)	362 (74%)	284 (78%)	264 (72%)	10,243 (72%)
Foreign Name	2,674 (27%)	347 (41%)	118 (25%)	162 (39%)	123 (28%)	221 (31%)	135 (28%)	112 (31%)	124 (34%)	4,016 (28%)
Foreign Appearance	2,724 (27%)	362 (43%)	121 (26%)	158 (38%)	124 (28%)	231 (32%)	132 (27%)	112 (31%)	136 (37%)	4,100 (29%)
Reading Score	.12 (1.23)	-.97 (1.15)	-.28 (1.35)	-.47 (1.26)	-.13 (1.19)	-.45 (1.16)	.20 (1.22)	.16 (1.25)	-.39 (1.25)	-.02 (1.26)
Math Score	.16 (1.22)	-.72 (.92)	-.35 (1.04)	-.39 (1.11)	-.12 (1.14)	-.37 (1.05)	.24 (1.32)	.17 (1.23)	-.22 (1.21)	.03 (1.22)
HOMEPOS	6.09 (1.52)	5.29 (1.65)	5.66 (1.64)	5.42 (1.68)	5.72 (1.58)	5.76 (1.56)	6.34 (1.49)	6.12 (1.51)	5.62 (1.71)	5.97 (1.57)
Gender										
Female	4,918 (49%)	413 (49%)	242 (51%)	208 (50%)	246 (55%)	375 (52%)	253 (52%)	200 (55%)	175 (47%)	7,477 (50%)
Age in Months	185.6 (7.1)	188.7 (8.1)	187.7 (8.2)	188.2 (9.0)	186.7 (7.1)	189.9 (9.1)	185.7 (7.5)	185.4 (7.1)	188.1 (9.5)	186.2 (7.6)
TOTAL	10,040 (100%)	847 (100%)	471 (100%)	416 (100%)	446 (100%)	719 (100%)	488 (100%)	366 (100%)	369 (100%)	14,162 (100%)

First labor migrants arrived in Germany during the 1960s and early 1970s to compensate for the shortage of labor force during the German industrial expansion. These groups largely consist of men with low educational and occupational qualifications from Turkey, Southern Europe and former Yugoslavia. Unlike the latter two, the migration from Turkey continued through family unifications and illegal migration after the end of the formal labor migration in mid 1970s. In terms of parental educational attainment and occupational status, students with Turkish and former Yugoslavian origins are still far behind not only of their German peers, but also of those immigrant children with Polish, the FSU and European backgrounds (Table 1).

Fifty years since their initial arrival, Turkish families have exceptionally integrated into the low-income and low-education strata of the German society. The distribution of parental socioeconomic resources among the second- and third-generations reveals that the descendants of Turkish labor migrants show a “persistence of [their unequal] positions in [the German] hierarchy” (Duncan, 1968, p. 681, cited in Grodsky & Jackson, 2009, p. 2347).

The migrants from the former republics of the Soviet Union constitute the second largest immigrant community in Germany, arriving shortly after the Cold War. Most of these are return migrants with German ancestry; they arrived with relatively higher formal qualifications and stronger German language skills than labor migrants. The migrants from the FSU received unprecedented state support for integration and settlement, with rights to naturalize almost immediately after their arrival (Euwals, Dagevos, Gijsberts, & Roodenburg, 2010; Wegmann, 2014). They were not a negatively selected group based on human and economic capital, and their arrival coincided with a time when “the homogenous self-image of German society had begun to change and immigrant integration had become a major issue of political debate” in Germany (Schulz & Leszczensky, 2015, p. 3). Thus, they found themselves in a supportive context of incorporation.

Labor migrants, especially with Turkish origin and the return migrants from the FSU are arguably the most politically relevant immigrant groups due to the size of the communities, as well as the national debate they generated on immigration policy. The recent migrants from Poland are not ethnic Germans; nor are they labor migrants (Worbs, Bund, Kohls, & Babka von Gostomski, 2013). The Polish students appear to be a particularly successful group, whose performance in both domains almost match their German peers and they come from higher SES families than the descendants of labor migrants.

To these groups, I add descendants of immigrants from Northern and Western Europe (N-W-Europe), Eastern Europe, as well as those who originate from the remainder countries in Asia (see Table 2). Given the size of the continent, drawing substantive conclusions about the Asian immigrants is hardly possible. Yet, it is promising to include them in my sample, as migration scholars rarely study them in the European contexts. The N-W-Europe and Eastern European students, on the other hand, represent groups with limited integration challenges and positively selected immigrants, as they come from families with

Table 2. The Generation Status by Immigrant Group.

	Native German	Turkey	Southern Europe	Former Yugoslavia	Poland	Former Soviet Union	Northern & Western Europe	Eastern Europe	Asia	TOTAL
First Generation	N/A	53 (6%)	21 (5%)	28 (7%)	38 (9%)	141 (20%)	25 (5%)	14 (4%)	38 (10%)	375 (10%)
Second Generation	N/A	759 (90%)	288 (61%)	304 (73%)	303 (68%)	569 (79%)	232 (48%)	156 (43%)	316 (86%)	3,063 (79%)
Third Generation	N/A	35 (4%)	162 (34%)	84 (20%)	105 (24%)	9 (1%)	231 (47%)	196 (54%)	15 (4%)	1,439 (11%)
TOTAL	10,040 (100%)	847 (100%)	471 (100%)	416 (100%)	446 (100%)	719 (100%)	488 (100%)	366 (100%)	369 (100%)	14,162 (100%)

Notes:

1. Students from Turkey include the Kurdish minority in Turkey as well.
2. Southern European countries include Greece, Italy, Spain and Portugal, who signed guest-worker agreements with the German government in the 1960s.
3. The immigrants from former Soviet Union are the return migrants – *Spaetaussiedler*, who migrated back to Germany with the end of the Cold War. Therefore, only 9 (1%) of them are third generation. Therefore, I do not report the results about this subgroup.
4. Northern and Western European countries include Austria, Belgium, Denmark, Finland, France, Ireland, Luxembourg, the Netherlands, Norway, Sweden, Switzerland, and the United Kingdom.
5. Eastern European countries consist of Albania, Bulgaria, Cyprus, Czech Republic, Hungary, Romania, and Slovakia.
6. Asian countries consist of the remainder of Turkey and the FSU, including a large range of countries from the Middle East to Japan.

high formal qualifications, and they show high levels of achievement in both math and reading (see [Table 1](#)).

Today, majority of labor migrant communities in Germany are second- and third-generation; the latter from Turkey is miniscule due to marriage migration among the community. The first-generation migrants are most common among the return migrants from the FSU, whereas a considerable portion of Western and Eastern European groups is third-generation, indicating the longer duration of stay of families in Germany (see [Table 2](#)). Finally, the Asian students, who are rarely studied previously by education and migration scholars in the German context, are predominantly second-generation migrants.

DATA AND METHODS

This study uses data from the first and second waves of ninth grade cohort drawn from the German National Educational Panel Study (NEPS) collected in Fall 2010 and Spring 2011 ([Blossfeld et al., 2011](#)). The NEPS ninth grade sample was chosen with a multi-stage stratification method: first, the six school types in the German secondary education are sampled, followed by sampling schools within each stratum ([von Maurice, Sixt, & Blossfeld, 2011](#)). Compared to previous datasets in Germany and the national census, the advantage of the NEPS dataset is that it collects extensive information on the generation status of students with any “migration background” by inquiring about the country of origin not only of students’ parents but also grandparents ([Kalter, 2008](#); [Kemper, 2010](#)).

The key reason for choosing the ninth grade sample is that in Germany, ninth grade is the point in students’ educational career where some change is still possible but by this point they should have a realistic sense of anticipating what educational attainment they will accomplish in the future. Their school track strongly determines whether or not students will obtain an AHSQ, and they have already been attending these schools for at least four years. Examining ninth grade immigrant students in comparison to their German peers allows me to estimate the gaps between the realistic expectations and idealistic aspirations of students.

Using list-wise deletion with the NEPS sample generates bias due to the large reductions in sample size, as well as high levels of missing information among immigrant students ([Zinn, 2013](#)). Thus, I use the multiple imputation with chained equations method to impute the missing values of three measures of socioeconomic status and reading and math scores ([StataCorp, 2013](#); [White, Royston, & Wood, 2011](#))⁷ I created 30 multiple imputation files to ensure the robustness of my estimates ($M = 30$). My imputation equations include sampling weights from the NEPS dataset to account for the stratified sampling and students’ participation in the Fall and Spring waves ([Wenzig, 2012](#)). In my estimations, I use unimputed versions of educational aspiration measures, because they are nominal categorical variables and the numbers of cases missing these values are small enough to allow unbiased estimations.⁸

I focus on the educational aspirations of immigrant students from eight immigrant communities in the German context: descendants of labor migrants from Turkey, former Yugoslavia, and Southern European countries (Greek, Italian, Spanish and Portuguese), as well as more recent migrants from Poland and return migrants with German ancestry from the former Soviet Union (FSU)—*Spätaussiedler*, Northern-Western Europeans (NWE), Eastern Europeans and Asians. Immigrant students are either themselves are, or one of their parents, or one of their four grandparents are born in one of these countries or regions, as the citizenship status is not an accurate measure of migration background in the German context (cf. Kristen, Olczyk, & Will, 2016). The immigrant sample consists of 4,122 students. Native German students ($N = 10,004$) are the reference category, and the analyses are based on whether and how immigrant students' and their perceptions of their parents' aspirations differ from those of native Germans.⁹

Generation Status and Duration of Stay

I expect the generation status of the students to play a major role in their educational aspirations (see Table 2). If there is indeed optimism and lack of information that leads to higher educational aspirations, then a longer duration of stay should alleviate the effects of these explanations. Experience may teach immigrant families the difficulties posed by the German secondary school system. Using interaction models with generation status and immigrant group dummies separately is not a correct specification for my models, because native German students are the omitted category. Thus, I constructed dummy variables for each immigrant community by generation status. This specification also renders the estimated coefficients easier to interpret, but it reduces the statistical power and increases the standard errors for immigrant group-generation categories that are relatively uncommon.¹⁰

SES, Achievement and Control Variables

High levels of immigrant aspirations are especially apparent, once factors such as socioeconomic origin and student achievement are accounted for (Becker & Gresch, 2016, p. 108). In this study, I use three measures of socioeconomic origin for students: highest educational attainment of the mother, parental occupational status (five-category version of the EGP class scheme; Erikson & Goldthorpe, 1992; Jackson, Erikson, Goldthorpe, & Yaish, 2007), and the number of the books in the household (see Table 1). I measure books as an ordinal categorical variable since using it as a continuous variable violates the linearity assumption. In addition, I use a measure of family's possession of certain material and cultural items that might be associated with students' school performance. This index of home possessions comprises of eight items such as a study desk, a private room, a computer, educational software, a dictionary, access to the Internet, classic literature or poetry books and works of art. To measure student achievement, I use the standardized reading and math test scores of

students. Finally, I add the school type to my models to test whether track placement imparts realism to students' aspirations. All models control for the gender and the age and age-squared of students and whether the student has a sibling.

Finally, in order to test whether the blocked opportunities framework plays a role in immigrant students' idealistic aspirations, I use four measures of students' anticipated discrimination to find an apprenticeship. After inquiring about students' apprenticeship plans and potential opportunities, the NEPS student questionnaire poses the following question: "It is not easy to find an apprenticeship. Do you think that you are more likely to be turned down, if you do not speak German so well?" I use four different formulations of this question, which cover alternative ways of discriminatory practices; about students' limited German skills, having a degree from a lowest high-school type (*Hauptschule*), foreign physical appearance and foreign sounding name (see Table 1).

BIVARIATE RESULTS

In the German context, studies operationalize educational aspirations as receiving an AHSQ, because it is the only path to entering a university or a university of applied sciences. This study uses two dependent variables for students' aspirations, and two dependent variables for parental aspirations. The NEPS ninth grade questionnaire distinguishes between students' idealistic and realistic educational aspirations (Becker & Gresch, 2016, p. 89; Stocke, 2005a, 2005b) by specifically asking students what high-school qualification they would like to have and what qualification they will actually obtain (Wenzig, 2012).

Table 3 reports students' realistic and idealistic aspirations for an academic level high-school qualification. The idealistic aspirations are measured by the question: "No matter what school you are attending and how good your grades are, what school-leaving qualification would you like to have?" whereas realistic aspirations are measured by the question: "When you consider everything you know now: what qualification will you actually obtain when you finish school?" The idealistic aspirations for an *Abitur* degree vary between 43% (Southern Europe) and 64% (N-W-Europe) for the entire group. Realistic aspirations for an academic high-school education are substantially lower for all groups (Table 3, Panel 2). This indicates that students already have a clear sense about their chances for receiving an *Abitur* degree. In fact, the distribution of responses roughly reflects the school types they attend (Table 1).

For parental aspirations, I use two indirect measures, which are reported by students, rather than directly by parents themselves. This is not an inaccurate method, as my aim is to examine what students think that their parents' aspirations are, i.e., what immigrant parents have communicated to their children. It is not really the objective to examine what the parental aspirations are, unless the students are aware of them. This, however, has the potential bias of students over or underestimating their parents' actual beliefs. In addition, the parent

Table 3. Educational Aspirations of Students by Immigrant Group.

	Native German	Turkey	Southern European	Former Yugoslavia	Poland	Former Soviet Union	North. & Western Europe	Eastern Europe	Asia	Total
Idealistic Educational Aspirations										
Without Any Degree	3 (0%)	1 (0%)	0 (0%)	2 (1%)	0 (0%)	1 (0%)	0 (0%)	1 (0%)	1 (0%)	10 (0%)
<i>Hauptschule</i> Degree	478 (5%)	47 (6%)	46 (10%)	29 (7%)	22 (5%)	38 (5%)	15 (3%)	14 (4%)	12 (3%)	707 (5%)
<i>Realschule</i> Degree	3,361 (34%)	330 (39%)	181 (38%)	170 (41%)	135 (30%)	300 (42%)	124 (25%)	107 (29%)	100 (27%)	4,843 (34%)
<i>Abitur</i> Degree	5,568 (56%)	406 (48%)	203 (43%)	196 (47%)	266 (60%)	330 (46%)	314 (64%)	220 (60%)	233 (63%)	7,851 (55%)
Missing	630 (6%)	63 (7%)	41 (9%)	19 (5%)	23 (5%)	50 (7%)	35 (7%)	24 (7%)	23 (6%)	917 (6%)
TOTAL	10,040 (100%)	847 (100%)	471 (100%)	416 (100%)	446 (100%)	719 (100%)	488 (100%)	366 (100%)	369 (100%)	14,162 (100%)

Realistic Educational Aspirations

Without Any Degree	19 (0%)	6 (1%)	1 (0%)	4 (1%)	3 (1%)	3 (0%)	1 (0%)	0 (0%)	3 (1%)	41 (0%)
<i>Hauptschule</i> Degree	1,300 (13%)	222 (26%)	114 (24%)	89 (21%)	75 (17%)	148 (21%)	57 (12%)	39 (11%)	48 (13%)	2,113 (15%)
<i>Realschule</i> Degree	4,117 (41%)	346 (41%)	200 (43%)	190 (46%)	182 (41%)	354 (49%)	163 (33%)	159 (43%)	147 (40%)	5,921 (41%)
<i>Abitur</i> Degree	3,829 (38%)	209 (25%)	108 (23%)	108 (26%)	161 (36%)	154 (21%)	227 (47%)	142 (39%)	143 (39%)	5,150 (36%)
Missing	775 (8%)	64 (8%)	48 (10%)	25 (6%)	25 (6%)	60 (8%)	40 (8%)	26 (7%)	28 (8%)	1,103 (8%)
TOTAL	10,040 (100%)	847 (100%)	471 (100%)	416 (100%)	446 (100%)	719 (100%)	488 (100%)	366 (100%)	369 (100%)	14,162 (100%)

Note: For the logistic regression models, I use binary dependent variables with 1 referring to aspirations for an *Abitur* degree (academic high-school qualification-AHSQ); the 0 category includes all other responses.

interviews of the NEPS have a very high unit non-response rate among immigrant parents. This does not allow for unbiased comparisons.

The first panel of [Table 4](#) reports the students' responses to the question: "What is the highest school-leaving qualification your parents would like you to obtain?" The distribution of their perceptions of their parents' idealistic aspirations is pretty much the same as their own aspirations. Second perception of parental aspirations is based on the following question: "What kind of education would your parents like you to get after you leave school?" The significance of this question is that the available responses include both going to college, as well as continuing an apprenticeship (*Berufsausbildung*). Given the central role of the vocational education in the German system, it is important to test whether immigrant and native students differ from each other in terms of choosing between academic and vocational education. Given the lack of opportunities for going to college, some parents might prefer their children to complete a vocational training and secure a job in the future. There is not a clear pattern of choosing between one over the other. Turkish, Polish, N-W-European, Eastern European and Asian students more likely to report that their parents would like them to go to college, whereas German, Southern European, former Yugoslavian students report a choice for an apprenticeship. Those with the FSU origins, the percentages are equal between the two options.

HYPOTHESES

H1. My first hypothesis focuses on how the immigrant groups differ from each other in terms of their educational aspirations. Considering that Turkish, Asian and former Yugoslavian immigrant students have the lowest levels of SES backgrounds, I expect them to have the highest levels of idealistic educational aspirations relative to German natives and to see their parents as putting the emphasis on their career success. In addition, Turkey, former Yugoslavia and Eastern European countries have relatively low rates of enrollment in tertiary education, which would also contribute to the optimism of students from these countries, and let them to develop relatively higher educational aspirations and see their parents as having high academic ideals for them.

H2. The second hypothesis follows from [Buchmann and Park's \(2009; see also Parker et al., 2016\)](#) contention that a highly differentiated education system imparts a sense of realism on the formation of educational aspirations. Therefore, even if they have higher idealistic educational aspirations, I expect that the immigrant students do not differ from their German peers when asked about their realistic aspirations. A gap between realistic and idealistic aspirations would indicate that immigrant students are not overly optimistic, nor they suffer from information deficit, but

Table 4. Perceived Educational & Career Aspirations of Parents by Immigrant Group.

	Native German	Turkey	Southern European	Former Yugoslavia	Poland	Former Soviet Union	North. & Western Europe	Eastern Europe	Asia	TOTAL
Idealistic Educational Aspirations of Parents										
<i>Hauptschule</i> Degree	424 (4%)	31 (4%)	29 (6%)	22 (5%)	15 (3%)	25 (4%)	11 (2%)	9 (3%)	6 (2%)	577 (4%)
<i>Realschule</i> Degree	3,495 (35%)	304 (36%)	173 (37%)	154 (37%)	148 (33%)	278 (39%)	130 (27%)	117 (32%)	82 (22%)	4,914 (34%)
<i>Abitur</i> Degree	5,043 (50%)	436 (52%)	208 (44%)	203 (49%)	254 (57%)	335 (47%)	287 (59%)	196 (54%)	240 (65%)	7,314 (51%)
Have No Opinion	250 (3%)	11 (1%)	10 (2%)	11 (3%)	6 (1%)	15 (2%)	18 (4%)	15 (4%)	11 (3%)	350 (2%)
Missing	828 (8%)	65 (8%)	51 (11%)	26 (6%)	23 (5%)	66 (9%)	42 (9%)	29 (8%)	30 (8%)	1,173 (8%)
TOTAL	10,040 (100%)	847 (100%)	471 (100%)	416 (100%)	446 (100%)	719 (100%)	488 (100%)	366 (100%)	369 (100%)	14,162 (100%)

Table 4. (Continued)

	Native German	Turkey	Southern European	Former Yugoslavia	Poland	Former Soviet Union	North. & Western Europe	Eastern Europe	Asia	TOTAL
Idealistic Aspiration for Vocational (Ausbildung) and Academic Education										
To go to College	3,536 (35%)	415 (49%)	160 (34%)	163 (39%)	203 (46%)	298 (42%)	226 (46%)	158 (43%)	233 (63%)	5,392 (38%)
To do an Apprenticeship	4,358 (43%)	292 (35%)	218 (46%)	191 (46%)	170 (38%)	301 (42%)	147 (30%)	140 (38%)	84 (23%)	5,901 (42%)
To get no training	57 (1%)	9 (1%)	5 (1%)	3 (1%)	5 (1%)	3 (0%)	1 (0%)	3 (1%)	3 (1%)	89 (1%)
Have No Opinion	1,051 (11%)	39 (5%)	27 (6%)	27 (7%)	28 (6%)	39 (5%)	57 (12%)	31 (9%)	20 (5%)	1,319 (9%)
Missing	1,038 (10%)	92 (11%)	61 (13%)	32 (8%)	40 (9%)	78 (11%)	57 (12%)	34 (9%)	29 (8%)	1,461 (10%)
TOTAL	10,040 (100%)	847 (100%)	471 (100%)	416 (100%)	446 (100%)	719 (100%)	488 (100%)	366 (100%)	369 (100%)	14,162 (100%)

Note: For the logistic regression models, I use binary dependent variables with 1 referring to aspirations for an *Abitur* degree (AHSQ) for the first variable. The 0 category also include the “Have no Opinion” responses. For the second variable, the category 1 refers to “go to college,” and “do an apprenticeship” is the 0 category. I did not include the other options into the 0 category, as the aim is to understand the differences in choosing academic over vocational education.

reflect a realistic appraisal of the consequences of not getting the academic educational credentials.

H3. Longer duration of stay in Germany should attenuate the high aspirations associated with the act of immigration to a country with greater educational opportunities, and thus have a regressive effect on the high aspirations of immigrant students. I expect that both idealistic and realistic educational aspirations to decrease for each immigrant group as the generation status of the students shifts from the first- to the second- and third-generations.

MULTIVARIATE RESULTS

Educational Aspirations of Immigrant Students and Parents

In the first set of models, I use logistic regressions of realistic and idealistic aspirations for immigrant students and parents' aspirations (reported by students) by country of origin with native Germans as the omitted category. The dependent variables are binary; "1" equals to aspirations for an AHSQ, and "0" representing other alternatives. For the parental aspiration measures the "0" category also includes the "Have No Opinion" category, as it does not express the focal choices of the relevant questions. For the second parental aspiration variable, I exclude the students who picked a choice besides college and apprenticeship, as my focus is on how likely they report a preference for an academic education over a vocational one. In order to account for the between-group heterogeneity of the estimates of control variables, I interact all SES and achievement controls with the country of origin dummies.

Table 5 reports the odds ratios from logistic regression models with four different dependent variables. Results on the first column support my first hypothesis that compared to native Germans, Turkish, former Yugoslavian and Asian students are most likely to idealistically aspire for an AHSQ, once the models control for students' SES background, school type and achievement levels. Turkish students are five times more likely; former Yugoslavian and Asian students are three times more likely; and students from FSU are 2.5-times more likely than their native German peers to aspire for an AHSQ. The Polish and Southern European groups appear twice more likely to have aspirations for an AHSQ. The estimations reveal that students who originate from countries with lowest opportunities for attending college and lowest levels of tertiary enrollment have the highest educational aspirations. The opposite is true for those students who originate from European countries—Southern, N-W-Europe and Poland, where opportunities for tertiary education are higher than or as high as Germany (see Table A.1). Eastern Europeans are the only exception to this. This, however, is not surprising, as the majority of them are third-generation migrants, who arrived in Germany shortly after 1949 from the newly founded socialist republics and probably are a positively selected group on educational attainment. They might be ethnically German as well. Finally, despite arriving

Table 5. Logistic Regression Analysis of Students' & Parents' Educational Aspirations by Immigrant Group: Odds Ratios.

	Student Aspirations		Parental Aspirations	
	M1: Idealistic Aspirations (<i>N</i> = 13,061)	M2: Realistic Aspirations (<i>N</i> = 12,823)	M3: Educational Aspirations (<i>N</i> = 12,837)	M4: College vs. Apprenticeship (<i>N</i> = 11,176)
Turkish	4.94*** (1.59)	1.81 (.91)	7.09*** (2.17)	3.35** (1.40)
Southern European	2.39* (.91)	1.07 (.56)	1.99† (.73)	1.54 (.81)
Yugoslav	2.80* (1.16)	2.34 (1.57)	5.01*** (1.95)	5.32** (2.83)
Polish	2.36* (.96)	1.70 (1.03)	2.09† (.80)	6.90*** (3.77)
Former Soviet Union	2.54** (.73)	2.73* (1.15)	2.98** (.93)	3.84** (1.62)
North-West European	2.39* (.89)	1.19 (.72)	2.04† (.79)	4.21* (.15)
Eastern European	.85 (.37)	3.25* (1.54)	1.44 (.60)	2.16 (1.30)
Asian	3.06* (1.40)	2.11 (1.38)	3.80** (1.81)	3.05† (1.99)
Constant (native German)	.17*** (.05)	.04*** (.02)	.11*** (.03)	.16*** (.06)
<i>F</i> -Score	26.43 (.0000)	32.36 (.0000)	27.27 (.0000)	26.06 (.0000)

Note: * $p < .05$ ** $p < .01$ *** $p < .001$; † $p < .10$. Robust standard errors are in parentheses. The constant is the main effect estimates for the native German category. All models control for students' gender, age, age-squared and whether or not they have a sibling, as well as for SES, home possessions and school type they attend.

in Germany as labor migrants initially, Southern European youth constitute a relatively well-accommodated group. My results consistently show that their educational aspirations are very similar to those of native Germans.

The estimations on the second column show that when asked about realistic aspirations, the Turkish students do not have high aspirations for an AHSQ compared to their German peers. Realistically they are aware of the fact that they will not be able to graduate from an academic level high-school. For former Yugoslavian and Asian students, the statistical significance similarly disappears but the change in the size of the odds ratios is not as large. We observe similar decreases in aspirations of Southern European, Polish and N-W-European students. For students from the FSU, realistic aspirations are very similar to idealistic ones. This, however, does not reflect their trajectories; in my sample only 1 out of 5 students from the FSU attend an academic high-school. Thus, given their secondary school tracks, the high realistic aspirations of the FSU migrants are either optimistic for switching to an academic track or they reflect an information deficit among them.

This picture provides strong support for my second hypothesis that realistically immigrant students do not report high aspirations. The changes in odds ratios suggest that Turkish students are well aware of their potential qualifications at the end of high-school. As the immigrant group in Germany, which is the least likely to achieve an AHSQ and least likely to attend university, the students with Turkish origins attribute especially high value to academic credentials. Even though realistically, they are aware of the fact that they are not actually going to obtain an academic qualification, they continue to value it as an ideal. This, in fact, might be interpreted as a reflection of the continuing disadvantage in access to higher education among the Turkish immigrant students, since they are implicitly reporting a thwarted ambition for degrees that they are realistically unable to attain. This situation is partly observed for the aspirations of former Yugoslavian and Asian students as well.

When asked about their parents' educational aspirations about their future, the same four groups – Turkish, former Yugoslavian and Asian and the students from the FSU report highest levels of aspirations for an academic high-school degree relative to their native German peers. Students from the FSU and Asia report high levels of parental aspirations similar to their own. However, for Turkish and former Yugoslavian students, the aspirations of parents relative to German parents are higher than the ones they report for themselves compared to their German peers. The Turkish and former Yugoslavian families have relatively lower levels of human and economic capital than other migrant parents. Therefore, they might be highly ambitious in their idealistic aspirations for their children than both native German and other immigrant groups. But from the available data, it is not possible to reach a clear conclusion about this.

Parental idealistic aspirations are lowest among the immigrants with high levels of parental human and economic capital, that is, Polish and all European groups. This finding suggests that these groups are well-integrated immigrants in the German context with educational outcomes similar to those of native

Germans. Arguably, they are also the ones with highest cultural proximity with the German society.

In terms of choosing between academic and vocational education (Model 4), there is a less clear differentiation within the immigrant groups that almost all of them are very likely to prefer academic education to vocational education – Eastern and Southern Europeans are the two exceptions with similar preferences to those of native Germans. For Polish and N-W-European parents, preference for academic education is not a mismatch as their children attend academic track at relatively higher rates. However, for Turkish and former Yugoslavian ones, this might be interpreted as the lack of familiarity with the opportunities provided by vocational education. In a context with limited chances for their children to enter higher education, the preference of parents – reported by their children – is for an academic education over vocational education. It remains unclear whether the students themselves would have the same preferences. However, it is clear that relative to German parents, immigrant parents are more likely to opt for an academic education over a vocational one.

To sum up, the descendants of positively selected, highly educated immigrant groups tend to develop similar aspirations to native Germans, as they do probably have higher opportunities for entering higher education, whereas the less advantaged groups with larger problems of educational integration reveal higher idealistic aspirations. Not surprisingly, the former group is mostly European migrants, who originate from countries with relatively high rates of tertiary enrollment rates, and who experienced smoother integration processes following their arrival in Germany. Turkish students have the highest levels of idealistic and lowest levels of realistic aspirations; a key finding that challenges the immigrant optimism and information deficit frameworks, but show a conscious appraisal for an AHSQ.

The Role of Duration of Stay

Next, I test the relationship between generation status and educational aspirations. This issue primarily relates to the theoretical explanations that articulate high educational aspirations of immigrant communities with their optimism and information deficit (Relikowski et al., 2012). If these explanations are valid, immigrant parents and students' misinterpretation of their educational opportunities – their optimism and lack of information due to their act of immigration – should disappear as they spend longer time in Germany (Kao & Tienda, 1998); and their high educational aspirations should alleviate by second- and third-generation (Greenman, 2013).

Table 6 reports results from logistic regression models of idealistic educational aspirations of immigrant students and parents with immigrant-group-by-generation-status dummies to estimate the between generation categories of immigrant groups with native German students as omitted category.

Results show that the effects of duration of stay vary by the immigrant group. Most striking result is that the idealistic educational aspirations of both Turkish students and parents remain relatively high over three generations. Even the third-generation Turkish students, who are born to parents who grew up in

Table 6. Students' & Parents' Aspirations of Immigrant Group by Generation Status Dummies: Odds Ratios.

	Student Aspirations		Parental Aspirations	
	M1.A: Idealistic Edu. Aspirations (N = 13,061)	M2.A: Realistic Edu. Aspirations (N = 12,823)	M3.A: Parental Edu. Aspirations (N = 12,837)	M4.A: College vs. Apprenticeship (N = 11,176)
Turkish 1st	4.43** (2.36)	2.14 (1.84)	6.47*** (3.17)	2.82† (1.53)
Turkish 2nd	5.17*** (1.69)	1.83 (.90)	7.67*** (2.38)	3.66** (1.54)
Turkish 3rd	3.95* (2.17)	1.72 (1.35)	3.88** (1.77)	1.12 (.74)
Southern European. 1st	1.86 (1.59)	1.51 (1.00)	.50 (.36)	2.20 (1.65)
Southern European. 2nd	2.49* (1.02)	1.19 (.65)	2.69* (1.06)	1.53 (.85)
Southern European. 3rd	2.35* (.98)	.85 (.50)	1.42 (.56)	.77 (.47)
Yugoslav 1st	6.93** (4.32)	3.67 (2.92)	9.11*** (5.69)	10.87** (8.00)
Yugoslav 2nd	3.07* (1.33)	2.34 (1.73)	5.99*** (2.47)	5.28** (2.85)
Yugoslav 3rd	1.61 (.88)	1.59 (1.31)	2.28† (1.11)	1.99 (1.33)
Polish 1st	4.44* (2.94)	1.94 (1.87)	4.08* (2.61)	9.86** (6.72)
Polish 2nd	2.70* (1.15)	1.92 (1.15)	2.32* (.91)	6.02** (3.38)
Polish 3rd	1.09 (.55)	1.06 (.70)	.85 (.43)	2.15 (1.43)
Fmr. Soviet Union 1st	4.48*** (1.65)	5.48** (2.81)	3.93** (1.58)	5.67*** (2.71)
Fmr. Soviet Union 2nd	2.28** (.68)	2.25† (1.01)	2.86** (.91)	3.45** (1.52)
N-W. European 1st	1.59 (1.34)	.93 (.77)	1.18 (.87)	1.42 (1.50)
N-W. European 2nd	2.41* (.96)	1.36 (.83)	2.22† (.92)	6.07** (3.87)
N-W. European 3rd	2.67* (1.11)	.98 (.65)	2.12† (.85)	4.38* (2.80)
Eastern European 1st	6.65* (5.18)	7.12 (13.33)	10.54** (8.73)	11.42** (8.80)

Table 6. (Continued)

	Student Aspirations		Parental Aspirations	
	M1.A: Idealistic Edu. Aspirations (<i>N</i> = 13,061)	M2.A: Realistic Edu. Aspirations (<i>N</i> = 12,823)	M3.A: Parental Edu. Aspirations (<i>N</i> = 12,837)	M4.A: College vs. Apprenticeship (<i>N</i> = 11,176)
Eastern European 2nd	.67 (.32)	2.54 [†] (1.34)	1.25 (.57)	1.17 (.78)
Eastern European 3rd	.73 (.39)	3.50* (1.70)	.97 (.48)	.80 (.62)
Asian 1st	4.16* (2.81)	3.68 (3.14)	2.94 (2.06)	1.53 (1.25)
Asian 2nd	2.92* (1.34)	1.87 (1.23)	3.90** (1.85)	3.42 [†] (2.25)
Asian 3rd	.89 (1.20)	2.31 (2.20)	2.09 (2.60)	1.04 (1.71)
Native German (const.)	.16*** (.04)	.04*** (.01)	.10*** (.03)	.15*** (.06)
F-Score	24.95 (.0000)	30.48 (.0000)	25.43 (.0000)	22.94 (.0000)

Note: * $p < .05$ ** $p < .01$ *** $p < .001$; [†] $p < .10$. Robust standard errors are in parentheses. The constant is the main effect estimates for the native German category. All models control for students' gender, single-parenthood, age, age-squared, parental SES and the school type they attend.

Germany – both second-generation immigrants themselves – are four times more likely than their German peers to aspire for an AHSQ; this applies for the aspirations Turkish students report about their parents as well. This is another evidence against the immigrant optimism and information deficit frameworks among immigrant students with Turkish origin. High idealistic educational aspirations over three generations and low realistic aspirations for receiving an AHSQ indicates by ninth grade, the Turkish students are mostly aware of the fact that they are not going to receive an AHSQ by the end of high-school; yet they ideally strive for one. They are absolutely aware of the fact that a comfortable and affluent life in Germany depends on getting an academic qualification and anticipate blocked opportunities in labor market entry if they do not receive an AHSQ.

For other highly aspiring immigrant communities of former Yugoslavian, Polish, the FSU, and Asian origins, duration of stay indeed plays a significant role. Their idealistic aspirations decrease substantially by second- and third-generations, and the estimates lose statistical significance. This also applies for the educational aspirations of their parents. For these groups, the educational aspirations have an inverse relationship with the time the immigrant students and parents spend in Germany. The resemblance of immigrant students' aspirations to those of natives is similar to the pattern found among immigrant

students in the American context (Greenman, 2013; Kao & Tienda, 1998). For these communities, the initial high educational aspirations of first-generation students disappear among the second- and third-generation students. Preference for college attendance among parents is quite high among all first-generation students, and it steadily decreases when the generation status increases. The probable reason is that the longer the immigrant families stay in Germany, the more informed they become about the vocational alternatives and their potential opportunities for labor market entry.

To sum up, the Turkish immigrants remains the single group, who maintain high idealistic educational aspirations over generations; even though they realize that they are not going to receive an AHSQ by the end of high-school. For other groups, the high aspirations alleviate by second and third generations.

Anticipation of Discrimination

Finally, I test whether anticipating discrimination in labor market entry plays a role in boosting the educational aspirations of immigrant students and families. Table 7 reports results from models with four different controls for anticipated discrimination. The odds ratios of idealistic aspirations for Asian students become smaller and lose significance in all four models. It is clear that Asian students anticipate discrimination in employment due to foreign appearance, limited knowledge of German, graduating from *Hauptschule*, and foreign sounding name.

The Turkish students' educational aspirations only decrease in Model 6, when they are asked about their command of German language. In other three models, the odds ratios to aspire an AHSQ do not change. This constitutes evidence that Turkish students believe that they would not be discriminated against due to their appearance, foreign sounding name and whether or not they have *Hauptschule* degrees, but only when they have limited German skills. This might be interpreted as Turkish students regard the German labor market as meritocratic that only language issues would be a disadvantage. For former Yugoslavian students, the pattern is the opposite that of Turkish students. Their high aspirations decrease in all models except for Model 6. It appears like they are more concerned about discrimination due to their foreign sounding name and appearance rather than their language skills (see Models 7 & 8). Interestingly for students with FSU origin, the likelihood to aspire for an academic qualification increases; in fact, the odds ratio to aspire one becomes largest in Model 6, which controls for anticipated discrimination due to language skills. It is reasonable that they would not anticipate discrimination in finding apprenticeship because of their German ethnic origins.

All in all, the models of anticipated discrimination provide few interesting differences between immigrant groups depending on the type of discrimination students anticipate. Asians are the only group, whose aspirations for an AHSQ decrease with all controls of anticipated discrimination in the labor market, whereas for students from the FSU the odds ratios become larger in Models 5 through 8. However, it is difficult to arrive to clear conclusions with the available measures of anticipated discrimination based on a survey-questionnaire.

Table 7. Students' Idealistic Educational Aspirations with Blocked Opportunities Controls: Odds Ratios by Immigrant Group.

	Students' Idealistic Educational Aspirations				
	Model 5	Model 6	Model 7	Model 8	Model 1
Turkish	5.40** (2.67)	1.80 (1.76)	4.63*** (1.81)	5.68*** (2.31)	4.94*** (1.59)
Southern European	3.21 (2.35)	2.74* (1.29)	1.80 (.96)	1.74 (.90)	2.39* (.91)
Yugoslavian	2.20 (1.81)	9.12* (9.98)	2.30 (1.29)	1.82 (1.02)	2.80* (1.16)
Polish	3.34 [†] (2.44)	4.10 [†] (3.29)	1.74 (.86)	2.98* (1.45)	2.36* (.96)
Former Soviet Union	3.40 [†] (2.32)	5.39* (3.97)	2.98** (1.08)	2.87** (1.06)	2.54** (.73)
North-West European	3.07 (3.87)	3.33 (3.25)	3.04* (1.42)	2.00 (.97)	2.39* (.89)
Eastern Europe	.71 (.60)	.08** (.07)	.55 (.31)	.83 (.47)	.85 (.37)
Asian	1.94 (2.10)	1.92 (1.69)	2.25 (1.21)	1.93 (1.11)	3.06* (1.40)
Discrimination by School Type	2.31*** (.38)				
Discrimination by Language		1.72* (.39)			
Discrimination by Name			1.01 (.17)		
Discrimination by Foreign App.				1.03 (.17)	
Constant (native German)	.11*** (.04)	.11*** (.04)	.15*** (.05)	.14*** (.04)	.17*** (.05)
F-Score	20.06 (.0000)	20.50 (.0000)	20.30 (.0000)	20.17 (.0000)	26.43 (.0000)

Note: * $p < .05$ ** $p < .01$ *** $p < .001$; [†] $p < .10$. Robust standard errors are in parentheses. The constant is the main effect estimates for the native German category. All models control for students' gender, single-parenthood, age, age-squared, parental SES and the school type they attend.

DISCUSSION

This article provides important findings regarding the aspiration–achievement paradox observed among immigrant students and families in Germany. First, my findings challenge the immigrant optimism and information deficit frameworks by pointing to the distinction between idealistic and realistic aspirations. The ninth grade students with migration background who highly aspire for an

academic high-school level qualification (AHSQ) are not different from their German peers, when asked about the actual qualification they will obtain. In the German context, it is clear that highly differentiated secondary education imposes a sense of realism on immigrant students by ninth grade (Buchmann & Park, 2009; Parker et al., 2016).

The only exception to this finding is the students with the FSU origin, who express equally high aspirations both idealistically and realistically. Given their actual levels of attendance of an academic school track, this finding suggests that the optimism and information deficit explanations apply only to the students from the FSU. The likely reason for this outcome is that they are relatively recent migrants and less familiar about the German educational structure. Alternatively, they might be optimistic about continuing an academic track after they complete their actual school tracks they currently attend, even if this is a rare case in the German context.

Second, the students with Turkish origin are the only group with high idealistic aspirations through first-, second- and third-generations, whereas for all immigrant groups high aspirations attenuate over time, and completely disappear by the third-generation. Given this exceptional status and their realistic accounts of the degree they anticipate to obtain indicate that the Turkish students are not optimistic about their educational attainment; nor they suffer from an information deficit about the German secondary school system. On the contrary, they develop a conscious appraisal of obtaining an academic level degree in Germany. As the most educationally disadvantaged group with the least likelihood to attend academic school tracks, they maintain their idealism for receiving an AHSQ over generations. Students with the FSU, former Yugoslavian and Asian origins are also more likely to aspire an AHSQ compared to their German peers. Yet, their idealistic aspirations diminish with longer time their families stay in Germany, i.e., among the second- and third-generation students.

Finally, the patterns of aspirations clearly point to the importance of the social and historical conditions of arrival, and the position of the immigrant communities within the German social stratification system. We observe high educational aspirations particularly among the labor migrants, especially among those that come from families with low educational attainments and low occupational status: The Turkish and former Yugoslavian, as well as Asian students and parents are in this category of high aspirations. Families from the Southern European countries appear to be an exceptional labor migrant group as they develop similar aspirations to those of German natives. The cultural proximity to Germany and smooth transitions, as well as the higher likelihood of Southern Europeans to marry native German partners are potential explanations for this outcome. The Northern and Western European and Polish students represent a different pattern of educational aspirations. Unlike labor migrants, they more likely have professional parents with relatively higher educational credentials. They also enjoyed smoother transition periods after their arrival in Germany. Therefore, their educational aspirations are less ambitious and closer to the levels of native Germans.

The return migrants from the FSU represent another category in this picture. As nonlabor immigrants with ethnic German backgrounds, they develop higher idealistic and realistic aspirations than the native Germans. It is still not clear how the state support for settlement and naturalization and a relatively welcoming environment toward immigrants at the time of their arrival translate into the educational opportunities available to them. Their levels of performance and attendance to academic tracks, however, reveal that they are still behind immigrants with European origins.

The findings also suggest that educational opportunities and enrollment rates in tertiary education in the country of origin has an inverse relationship with the idealistic educational aspirations of immigrant students, as well as the level of aspirations they report about their parents. The immigrant students from Southern, Northern and Western European countries have the lowest levels of educational aspirations compared to their German peers, whereas highly aspiring Turkish and former Yugoslavian students originate from countries with low educational opportunities and low levels of tertiary employment. The Eastern European and Polish immigrant students do not fit the inverse relationship model between educational aspirations and opportunities in the country of origin, given the fact that these immigrants in Germany are a positively selected group with high educational and occupational credentials.

This study primarily suffers from not being able to test the changes of educational aspirations of students over time. It might be an interesting question to identify at which point in their school career the immigrant students realize the limited opportunities available to them for college entry. [Kao and Tienda's \(1998\)](#) seminal study shows that high educational aspirations of blacks and Hispanics in the United States decrease from eight through twelfth grade, indicating that educational aspirations change within relatively short span of a high-school career. In addition, even my anticipated discrimination variables are relatively direct measures of immigrant students' perceptions; discrimination is a very complex issue to measure via surveys. Furthermore, the immigration experiences vary greatly by the context of arrival and the position of the immigrant community in the German social status hierarchy. This would probably influence immigrant students' perceptions about discrimination, and might lead to endogeneity bias of my measures of discrimination.

CONCLUSION

This study suggests that one-size-fits-all explanations do not suffice to explain educational aspirations among immigrant students from different countries of origin. The immigrant students and parents arrive from different countries of origin; and given their position in the German social status hierarchy, they experience different set of educational opportunities. They also interpret these opportunity structures differently depending on the country of origin they arrive from (cf. [Portes & Zhou, 1993](#)). Therefore, the unfolding of "adjustment processes" to the German educational system vary among immigrant communities ([Becker & Gresch, 2016](#); [Greenman, 2013](#)). What the education and immigration scholars

need is more nuanced sets of explanations to understand this variation among immigrant students from different countries of origin.

Regarding the exceptional findings on the immigrant students of Turkish origin, this study raises two important questions: first, what is the reason behind the consistent high educational aspirations of Turkish students, given the fact that immigrant optimism, information deficit and blocked opportunities frameworks do not offer convincing explanations? Second, despite their high aspirations, why do Turkish students continue to be the most likely immigrant group to attend the lowest secondary school track and to be the lowest achievers at the ninth grade level? Answers to these questions require a closer examination of the disadvantaged position of the Turkish (and Kurdish) community in the German context. After half a century since their arrival in Germany, it appears that their social and economic segregation will likely to remain despite the increasing duration of stay.

The growth of the immigrant population at the school age poses a significant challenge for education and immigration scholars, and the policy makers in Germany. Today, the immigrant population in Germany is larger than ever, and they continue to experience limited opportunities for educational and occupational mobility. More importantly, these opportunities appear to be distributed unequally among immigrant communities. German and European policy makers might have to consider a more targeted set of policies for immigrant children, who are least likely to have access to early childhood education and who live in segregated neighborhoods and experience difficulties with acquiring German language skills.

NOTES

1. This paper uses data from the National Educational Panel Study (NEPS): Starting Cohort 4–9th Grade, doi:10.5157/NEPS:SC4:1.1.0. From 2008 to 2013, NEPS data were collected as part of the Framework Programme for the Promotion of Empirical Educational Research funded by the German Federal Ministry of Education and Research (BMBF). As of 2014, the NEPS survey is carried out by the Leibniz Institute for Educational Trajectories (LIfBi) at the University of Bamberg, in cooperation with a nationwide network.

2. In Germany, the official term for immigrants is “population with migration background” (*Bevölkerung mit Migrationshintergrund*) or “persons with migration background” (*Personen mit Migrationshintergrund*).

3. Using data from 13 countries, which who participated to in the 2003 PISA Study, Stanat et al. (2010) show that immigrant populations hold consistently higher levels of educational aspirations, measured as desires to go to college and their effort in math classes, and their expected jobs at the age of thirty. Their findings also show that optimism diminishes among second-generation students relative to the first-generation students (Stanat et al., 2010, p. 53).

4. After controlling for family social background and current math performance, the only exception to this finding is the second-generation students from the former Soviet Union (Stanat et al., 2010, p. 53).

5. Neugebauer, Reimer, Schindler, and Stocké (2013) report that a total of 14.4% of all students attending secondary school change tracks, about 11% to a less demanding track and 3% to a more demanding track (Neugebauer et al., 2013, p. 60).

6. Following Buchmann and Park (2009, p. 247), I use the term highly differentiated, rather than highly stratified. They emphasize that whether high degrees of between-school tracking leads to greater levels of stratification is a question to be answered with empirical evidence.

7. To assess the level of simulation error, following White et al. (2011), I re-estimated my models using a Monte Carlo error (MCE) of the multiple imputation results. My MCE estimates of coefficients based on 30 imputations satisfy the conditions proposed in the practical guidelines by White et al. (2011).

8. University of Wisconsin-Madison's Social Science Computing Cooperative's training suggests not to use "imputed values of the dependent variable in the analysis model" that the imputed values add no information to the analysis because they are already used in the imputation model (Social Science Computing Cooperative, 2013).

9. I exclude students whose country of origin cannot be determined ($n = 140$), or whose country of origin is different than the five regions under consideration ($n = 825$). I use 94% of the total number of students in the NEPS ninth grade sample.

10. The measures of generation status do not identify students with one native German parent and one immigrant born parent. Thus, measuring the effects of having one native parent is not possible with the current data.

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APPENDIX

Table A1. Participation in Tertiary Education.

Enrollment in Tertiary Education								
Germany	Turkey	Southern Europe	Former Yugoslavia	Poland	Former Soviet Union	North. & Western Europe	Eastern Europe	Asia
49.9%	24.8%	58.4%	41.4%	58.5%	69.9%	57.2%	32.2%	N/A

Source: Adapted from UNESCO's Education for All: The Quality Imperative Report (2004, Statistical Annex, Table 9: 318–325).

Note: The Asia category includes around 30 countries with a great variation in tertiary enrollment rates.