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# The Experience of Low-SES Students in Higher Education: Psychological Barriers to Success and Interventions to Reduce Social-Class Inequality<sup>1</sup>

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The economic decline of the Great Recession has increased the need for a university degree, which can enhance individuals' prospects of obtaining employment in a competitive, globalized market. Research in the social sciences has consistently demonstrated that students with low socioeconomic status (SES) have fewer opportunities to succeed in university contexts compared to students with high SES. The present article reviews the psychological barriers faced by low-SES students in higher education compared to high-SES students. Accordingly, we first review the psychological barriers faced by low-SES students in university contexts (in terms of emotional experiences, identity management, self-perception, and motivation). Second, we highlight the role that university contexts play in producing and reproducing these psychological barriers, as well as the performance gap observed between low- and high-SES students. Finally, we present three examples of psychological interventions that can potentially increase both the academic achievement and the quality of low-SES students' experience and thus may be considered as methods for change.

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The Great Recession (officially 2007–2009; U.S. Bureau of Labor Statis- tics, 2012) influenced Western societies at every level. One of the major issues associated with this crisis—the decline in the labor market—disproportionately influenced the current generation of young adults, leading some scholars to rename them the "lost generation" (Aronson, Callahan, & Davis, 2015; Scarpetta, Sonnet, & Manfredi, 2010). Given the scarcity of jobs, competition for employment increased tremendously. As a consequence, having a university degree became all the more critical for gaining and keeping employment in most Western countries. For example, during the recession in the U.S. context, individuals with lower levels of education (high school or less) were hit the hardest and claimed 78% of the job losses, while those with at least a bachelor's degree experienced job growth (Carnevale, Jayasundera, & Cheah, 2012). Moreover, after the recession came to a close, U.S. employment growth was the highest for those who hold a bachelor's degree or more (Carnevale, Smith, & Strohl, 2013; for employment statistics on the European context, see Mourshed, Patel, & Suder, 2014). Scholars predict that this trend is likely to continue, and that by 2020 postsecondary education will be required for 65% of jobs (Carnevale et al., 2013). This is a drastic shift from four decades earlier when only 28% of jobs required postsecondary education.

At the same time that a college degree has become pivotal to success in society, access to a college degree is out of reach for many. Indeed, among students 25–34 years old in the United States, those whose parents do not have a high school degree represent 8.15% of the student population (OECD,

<sup>&</sup>lt;sup>1</sup> This paper has been accepted for publication in the *Journal of Social Issues* in 2017. This version is a post-print.

2014). This extends to contexts beyond the United States. In France, for instance, this student category represents 9.61% of the student population (OECD, 2014). In addition to the economic barriers students may face in their access to college (Mourshed et al., 2014), converging evidence shows that after students enter higher education, their socioeconomic status<sup>2</sup> continues to influence their college experiences, academic achievement, and ultimately rates of graduation (e.g., OECD, 2014).

Past literature reviews and research reports that focus on differences in students' college experiences due to socioeconomic status have reported disparities in terms of college preparation, students' employment status while in college, and performance in college (Aronson, 2008; Engle & Tinto, 2008; Merritt, 2008; Spiegler & Bednarek, 2013; Tym, McMillion, Barone, & Webster, 2004; Walpole, 2003). For example, first-generation students (i.e., students whose parents do not have a bachelor's degree or higher) tend to have a lower grade point average (i.e., GPA; Chen & Carroll, 2005; Harackiewicz et al., 2014; Stephens, Hamedani, & Destin, 2014) and are more likely to leave college without a degree than are continuing-generation students (i.e., students who have at least one parent with a bachelor's degree or higher; DeAngelo, Franke, Hurtado, Pryor, & Tran, 2011).

The present article discusses the potential psychological barriers that low-SES students face in higher education as a result of the foundational cultural practices that guide how universities function. Indeed, as noted by Aronson (2008, p. 50), "the vast majority of research on class differences in postsecondary education has focused on objective patterns of enrollment and attainment. Subjective processes are a black box that has not been fully explored." Therefore, the present article aims to fill this gap by reviewing research on the psychological barriers associated with students' SES in higher education. By psychological barriers, we mean students' emotional experiences (e.g., emotional distress, well-being), identity management (e.g., sense of belonging), self-perception (e.g., selfefficacy, perceived threat), and motivation (e.g., achievement goals, fear of failure). To identify all relevant articles, we conducted an exhaustive search with several databases (e.g., PsycINFO, Google Scholar), using search keywords such as: low-SES college students, low-income college students, first-generation college students, emotions, anxiety, stress, identity, sense of belonging, threat, stereotypes, self-efficacy, self- perception, motivation, achievement goals, as well as variations of these search terms. Additionally, we examined the reference lists of previous review articles (e.g., Aronson, 2008; Spiegler & Bednarek, 2013; Stephens, Fryberg, Markus, Johnson, & Covarrubias, 2012) in order to achieve a comprehensive list of articles. The first section reports the findings from research published within the last 20 years that illustrates the psychological barriers that low-SES students face in higher education.

The second section presents mechanisms recently identified in the social- psychological literature for how and why these psychological barriers, as well as differences in performance, are sustained. In particular, we focus on how specific university practices and cultural norms contribute to the production and reproduction of these psychological barriers.

Finally, the third section reports three recent psychological interventions that may increase the quality of low-SES students' experience in higher education and decrease performance disparities.

# The Psychological Barriers Faced by Low-SES Students in Higher Education

Higher education is far from being a culturally neutral environment for low- SES students, notably because the system is "built and organized according to taken for granted, middle- and upper-class cultural norms, unwritten codes, or 'rules of the game" (Stephens, Fryberg et al., 2012, p. 1178). As a result, when low- SES students enter contexts of higher education and face these unknown "rules," they can experience psychological barriers in (1) emotional experiences (e.g., emotional distress, well-

<sup>&</sup>lt;sup>2</sup> Students' socioeconomic status (SES) refers to family rank in society, based on income, parental education, or occupation (Markus & Fiske, 2012). This article reviews research using various measures of students' SES (income, occupation, education.

being); (2) identity management (e.g., sense of belong- ing); (3) self-perception (e.g., self-efficacy, perceived threat); and (4) motivation (e.g., achievement goals, fear of failure). This section reviews these psychological barriers.

# Emotional Experiences

In the context of higher education, low-SES students' emotional experiences are quite different from the emotional experiences of high-SES students, such that low-SES students are more likely to feel and express greater emotional distress than high-SES students. More precisely, first- generation students exhibit higher levels of self-reported depression (Stebleton, Soria, & Huesman, 2014; Steptoe, Tsuda, Tanaka, & Wardle, 2007; Wang & Castan eda-Sound, 2008) and lower self-reported well-being than do continuing- generation students (Jenkins, Belanger, Connally, Boals, & Duron, 2013; Padgett, Johnson, & Pascarella, 2012; Tong & Song, 2004). In addition, first-generation students report having fewer opportunities to talk about their negative experiences (Barry, Hudley, Kelly, & Cho, 2009) and are more likely to feel guilty about their educational achievement (Covarrubias & Fryberg, 2015). Such negative emotional experiences also appear to be reflected in students' physiological functioning: In lab contexts that seek to reproduce traditional college contexts, low-SES students demonstrate higher levels of physiological stress markers than do high-SES students (John-Henderson, Rheinschmidt, Mendoza-Denton, & Francis, 2013; Stephens, Townsend, Markus, & Phillips, 2012).

#### Identity Management

Identity management is one of the toughest challenges low-SES students face when entering in the cultural context of higher education (Jetten, Iyer, Tsivrikos,& Young, 2008). Reay, Crozier, and Clayton (2009) notably refer to this as an "out of field experience" (p. 1110)—"the idea that low-SES students in traditionally high- SES environments experience a feeling of disjointedness in navigating the college environment versus the environment they grew up in. Indeed, higher education is a new and often unfamiliar environment for low-SES students, and they often have difficulty embracing their new identity as college students (Aries & Seider, 2005; Hinz, 2016; Lee & Kramer, 2013; Reay et al., 2009; Reay, Crozier, & Clayton, 2010; Venus Moschetti & Hudley, 2015).

In addition, as low-SES students are in the minority in higher education (Alon, 2009; Hearn & Rosinger, 2014), their underrepresented identity is likely to be quite often salient to them, regularly reminding them of their differences from others (Orbe, 2004; see also Martin, 2015). Consequently, low-SES students regularly report feeling like they "do not belong" in the college context (Harackiewicz et al., 2014; Ostrove & Long, 2007; Pittman & Richmond, 2007; Rubin, 2012; Soria & Stebleton, 2013) and are particularly prone to experience "imposter syndrome" (i.e., the feeling that they do not truly deserve to be there and that they fooled any- one who thinks otherwise, see Gardner & Holley, 2011). Such a feeling might also be explained by these students being aware of their underprivileged background (Sanders & Mahalingam, 2012). Finally, in this process of negotiating their new identity, low-SES students perceive less support from their families (Jenkins et al., 2013; Sy, Fong, Carter, Boehme, & Alpert, 2011) compared to high-SES students.

# Self-Perception

In higher education, low-SES students also have to deal with others' negative views of them. Indeed, much research shows that low-SES students suffer from negative stereotypes regarding their competence (i.e., low-SES individuals are perceived as less competent than high-SES individuals; Fiske, Cuddy, Glick, & Xu, 2002; see also Durante, Tablante, & Fiske, 2017; Volpato, Andrighetto, & Baldissari, 2017).

Such negative stereotypes and associated practices have implications for students' psychological functioning. Notably, low-SES students have lower perceptions of their competencies, report lower self-efficacy, and have lower self-reported perceptions of their own intelligence than do high-SES students (Hellman & Harbeck, 1997; Ivcevic & Kaufman, 2013, Kudrna, Furnham, & Swami, 2010; Ramos-Sanchez & Nichols, 2007; Stebleton & Soria, 2012). These negative stereo-types negatively influence low-SES students' psychological functioning in terms of emotions and cognition in the college context (e.g., Croizet & Claire, 1998; Harrison, Stevens, Monty, & Coakley, 2006; John-

Henderson et al., 2013; Spencer & Castano, 2007). Indeed, research on "stereotype threat" (for a recent review, see Pennington, Heim, Levy, & Larkin, 2016) shows that in situations where a group's negative stereotype is activated, members of the targeted group (e.g., African Americans on a test of intellectual abilities, Steele & Aronson, 1995; women on a math test, Spencer, Steele, & Quinn, 1999) are likely to feel threatened by the stereotype. More precisely, the fear of confirming the negative stereotype increases the cognitive and the emotional load, which may ultimately hinder their ability to perform up to their potential.

These negative stereotypes also contribute to classism—that is, "negative attitudes, beliefs, and behaviors directed toward those with less power, who are socially devalued" (Lott, 2012, p. 654). First-generation students can suffer from a form of classism that is specific to the higher education context (Langhout, Drake, & Rosselli, 2009; Langhout, Rosselli, & Feinstein, 2007) and that strongly affects their life and academic satisfaction (Allan, Garriott, & Keene, 2016).

#### Motivation

Previous research suggests that some forms of motivation are more useful than others to succeed in higher education (i.e., approach-oriented goals; see Linnenbrink-Garcia, Tyson, & Patall, 2008). Recent work on social-class achievement gap in higher education demonstrated that low-SES students endorse more deleterious forms of achievement motivation (i.e., avoidance-oriented goals) than do high-SES students. More specifically, first-generation college students are more likely to be afraid of failure (Bui, 2002) and thus more likely to endorse performance-avoidance goals in college (i.e., trying not to be outperformed by others, Jury, Smeding, Court, & Darnon, 2015; Jury, Smeding, & Darnon, 2015) than do continuing-generation students. Moreover, in competitive departments (e.g., civil engineering), first-generation college students are more likely to ex- perience less fit and consequently, more difficulty in maintaining mastery-goal endorsement (i.e., desire to progress, to master tasks), compared with continuing- generation students (Sommet, Quiamzade, Jury, & Mugny, 2015). Such motivation regulation may be particularly problematic for these students, due, notably, to the negative links usually observed between performance-avoidance goal endorsement and academic performance (Van Yperen, Blaga, & Postmes, 2014).

# Summary

Taken together, the research reviewed in this first section suggests that low- SES students experience psychological barriers (e.g., emotional distress, identity- management issues, negative self-perception, and more damaging forms of motivation) that may help to explain their worse academic outcomes (e.g., taking fewer classes, higher drop-out rates, and lower GPAs)<sup>3</sup>. The next section argues that the specific practices and cultural norms promoted in higher education play a key role in creating these psychological barriers.

# Psychological Mechanisms Underlying Social Reproduction in Higher Education

We now turn to how the psychological barriers and the performance gaps experienced by low-SES students are maintained and reproduced. Recent social psychological research suggests that SES-related differences in students' university experiences are best understood as a product of ongoing interactions between university settings and individuals (Browman & Destin, 2016; Smeding, Darnon, Souchal, Toczek-Cappelle, & Butera, 2013; Stephens, Markus, & Fryberg, 2012). In particular, we argue that university contexts are set up in ways that advantage high-SES students but disadvantage low-SES students.

<sup>&</sup>lt;sup>3</sup> The negative psychological experiences described in this section are not limited to elite universities. Indeed, the research reported here was conducted in different kinds of colleges (e.g., private, public, 4-year, 2-year, selective, not selective, community colleges). Low-SES students seem to struggle even in institutions that are quite heterogeneous and that have missions to serve low-SES students (e.g., community colleges, Fike & Fike, 2008; Hellman & Harbeck, 1997; Pascarella, Wolniak, Pierson, & Terenzini, 2003).

According to sociologist Pierre Bourdieu and his colleagues, the university system sustains the reproduction of social inequalities by promoting attitudes, speech, behaviors, and knowledge that are more congruent with the practices of high-SES families than of low-SES families (Bourdieu, Passeron, & Nice, 1990). Bourdieu and Passeron (1964, 1970) originally argued that low-SES students have a lower chance of success in higher education not only because of less access to economic capital (i.e., financial resources), but also because of less access to cultural capital (e.g., knowledge, behaviors, and values that can be more or less familiar to an individual and more or less promoted in a system; Becker, Kraus, Rheinschmidt, & Keltner, 2017). According to Bourdieu, the parents of low-SES students lack familiarity with the dominant culture of the university system and as a result are unable to effectively transmit the "appropriate" cultural capital to their children (Calarco, 2014; for a review on the difficulties between low-SES parents and school, see Lott, 2001). Below we describe two recent lines of research in social psychology that support Bourdieu's theories by documenting some specific university practices and cultural norms that contribute to the social reproduction of inequality.

First, the university's function of "selecting the best students" is one factor that contributes to the psychological barriers faced by low SES students. (Darnon et al., 2009; Darnon, Dompnier, & Poortvliet, 2012; Dornbusch, Glasgow, & Lin, 1996; see also Batruch, Autin, & Butera, 2017). Generally, the educational system serves two distinct functions that can shape university practices. First, universities have a goal to impart knowledge and educate students (i.e., the education function). Second, they have a goal to select individuals who are "the most able and motivated" in order to sort them into positions that vary in their status (i.e., the selection function; Dornbusch et al., 1996, p. 405). To reach the goal of selecting the best students, different selection procedures can be used. For example, selection can occur at the admissions level (e.g., in the Ivy League schools, fewer than 10% of the applicants are admitted as freshmen) or through features of the curriculum (e.g., qualifying exams). All such procedures are driven by the goal to select the students who are ostensibly the most deserving. However, as compared to the education function, the selection function consistently advantages high-SES students (Alon, 2009; Mijs, 2016; Smeding et al., 2013) and might act as a threat to low-SES students' identity. Illustrating this, one experiment asked students to read a text explaining that universities either have the function of selecting the most deserving students or have the function of helping all students succeed. When the university's function was described as selection, first-generation students performed worse than continuing- generation students on a math task (Jury et al., 2015; see also Smeding et al., 2013). However, when the university's function was described as education, there were no performance differences between first- and continuinggeneration students.

Second, taken-for-granted cultural norms in university settings can create psychological barriers for low-SES students, and, in turn, fuel the social- class gap in students' performance. Universities, particularly elite institutions, tend to promote independent values as the cultural ideal (e.g., learn to express yourself, learn to work independently) and are less likely to support interdependent values (e.g., learn to work with others, learn to adjust to others' expectations; Stephens, Fryberg et al., 2012; Stephens, Markus et al., 2012). Although independent values tend to be relatively congruent with how high-SES students view themselves, these values are relatively less congruent with the interdependent understandings common among low-SES students (Stephens, Markus, & Phillips, 2014). Consequently, when exposed to university materials framed independently, first-generation students feel less comfort and fit, experience greater levels of stress, and ultimately do not perform up to their potential (Stephens, Fryberg et al., 2012; Stephens, Townsend et al., 2012).

To summarize, these lines of research illustrate how university contexts can contribute to the reproduction of social inequalities and psychological barriers faced by low-SES students. First, they do so by institutionalizing "selection" as one of their purposes (i.e., in addition to the educational purpose), and second, by promoting cultural norms that align with high-SES students. The next section presents studies that have tested psychological interventions that seek to reduce the achievement gap between low- and high-SES students in higher education. Of course, for several reasons, including the fact that the achievement gap is susceptible to appear far before entering higher education (Sirin, 2005), eliminating the achievement gap is a challenge. Nevertheless, some interventions based on the above psychological mechanisms have proved to be effective in reducing this achievement gap.

Three Psychological Interventions Designed to Reduce the SES Achievement Gap in Higher Education

When considering how to reduce social-class achievement gaps in higher education, researchers and practitioners should recognize that these gaps are based not only on individual factors, but also the larger university contexts that students inhabit. This section presents three promising interventions that require little time and money to implement in college settings (for an additional example of psychological intervention, see Yeager et al., 2016).

# Self-Affirmation

Harackiewicz et al. (2014; see also Tibbets et al., 2016) conducted an intervention that sought to reduce the social-class achievement gap using self-affirmation, which has proven to be effective in reducing stereotype threat (Cohen, Garcia, Apfel, & Master, 2006). In this intervention, first- and continuing-generation students completed a writing exercise in their biology class: They read a list of values (e.g., independence, belonging to a social group) and chose either the two or three most important values for them (in the self-affirmation condition) or the two or three least important values (in the control condition). Then, students explained why these values were important to them (in the self-affirmation condition) or why these values might be important for someone else (in the control condition). At the end of the semester, first-generation students who had affirmed their values earned higher grades than those who did not affirm their values. This effect appeared both on the grades obtained in the biology class and on final overall GPA. Moreover, the intervention reduced first-generation students' concerns about their background. Thus, providing lower SES students with the opportunity to express their own values helped them to recover a sense of integrity, legitimacy, and fit in the academic context (Cohen & Sherman, 2014).

#### Difference-Education

Stephens et al. (2014) developed a novel intervention approach to reduce the social-class achievement gap, referred to as "difference-education." In this intervention, first- and continuing-generation first-year students participated in a 1-hour panel where older students discussed their experiences in college. In the difference-education condition, panelists shared their stories of how they adjusted to college, and they did so in a way that highlighted how their SES shaped their experiences. In the control condition, panelists told similar stories of college adjustment, but did not discuss the role of their backgrounds.

At the end of the school year, a follow-up survey found that first-generation students who attended the difference-education panel had higher grades and sought more academic resources than those who attended the control panel. Additionally, in a follow-up laboratory study conducted at the end of the second year, all students (regardless of SES) who attended the difference-education panel were more comfortable discussing their backgrounds in a speech task than students who attended the control panel (Stephens, Townsend, Hamedani, Destin, & Manzo, 2015). First-generation students who attended the difference-education panel were also better able to cope with stressful academic situations compared to first- generation students who attended the control panel. In sum, by helping all students to better understand how their SES matters in college, the difference-education intervention increased all students' comfort with their different backgrounds in university settings. At the same time, the intervention equipped first-generation students with the tools that they needed to overcome the challenges they faced in university settings.

# Goal Reframing

Smeding et al. (2013) conducted an intervention that sought to reduce the social-class achievement gap by changing the meaning of an exam. Specifically, they reframed its purpose to highlight the learning function of the exam instead of its selection function. Therefore, in this intervention, the exam was presented either as a tool to improve knowledge (i.e., a learning tool, "This exam has been designed to help students in their long-term learning in statistics") or as a tool to identify differences in students' abilities (i.e., a tool for selection, "This exam has been designed to compare students regarding their long-term learning in statistics"). Consistent with the idea that current exam practices foster the social- class achievement gap (Autin, Batruch, & Butera, 2015), results showed that when the exam was presented as a tool for selection, low-SES students performed worse than high-SES students. However, when the exam was presented as a tool for learning, low-SES students performed

just as well as high-SES students. Therefore, reinforcing the formative, learning-oriented function of an exam can reduce the achievement gap and help low-SES students to perform up to their potential.

#### **Limitations and Future Directions**

This article highlights the psychological barriers that low-SES students en- counter on the pathway to higher education. However, the psychological barriers faced by low-SES students in the college context are only part of the story, and this review is limited in not thoroughly discussing other aspects that influence low-SES students' psychological experiences. For example, researchers should also consider students' early experiences within the school system, as well as their racial or ethnic backgrounds.

#### Limitations

Low-SES students face barriers far before they enter higher education. The Program for International Student Assessment (PISA) regularly highlights the discrepancy in performance between low- and high-SES students at elementary or secondary school (OECD, 2013; for a meta-analysis see Sirin, 2005). One reason for this discrepancy is that many low-SES children do not benefit from strong support at home (e.g., have access to fewer books, less cognitive stimulation from

their parents, Evans, 2004) to develop their academic skills in math or reading (Bradley & Corwyn, 2002; McLoyd, 1998). Another factor is that low-SES students already have a long experience of classism and threat in the school system (Desert, Preaux, & Jund, 2009; Regner, Steele, & Huguet, 2014). These discrepancies in early experiences hinder low-SES students' preparation for college (Chen & Carroll, 2005) and also contribute to the gap between low- and high-SES students in obtaining higher education.

Additionally, students have multiple identities that may interplay with their SES in the higher education context. Indeed, many low-SES students are also racial or ethnic minorities (Spiegler & Bednarek, 2013). Intersectionality of race/ethnicity and SES can produce issues such as double stigmatization. For example, Ivcevic and Kaufman (2013) showed that low-SES students perceived their abilities as lower than high-SES students and that this effect was qualified by an interaction with ethnicity: Students who perceived themselves as having the lowest abilities were those who were both low-SES and members of ethnic minority groups (for another example of an interactive effect see Covarrubias & Fryberg, 2015). Thus, examining how students' SES interacts with ethnicity or gender (for an example, see Jenkins et al., 2013) in explaining students' psycho- logical experience in higher education is an avenue for future research.

#### **Future Directions**

The present article also makes salient that more research is needed to better understand the specific ways in which universities contribute to social inequalities. As the second section highlights, universities tend to promote cultural norms of independence (e.g., "pave your own path") rather than interdependence (e.g., "be part of a community"). Future work could examine how other ideas and practices that are part of the university culture might also fuel the social-class achievement gap and the barriers faced by low-SES students. For example, do universities endorse certain mindsets about the nature of intelligence (e.g., an entity theory) more than others (for an example of intervention based on a growth mindset of intelligence, see Yeager et al., 2016)?

In addition, although much research, including the research reviewed in this article, focuses on low-SES students in university settings, more work needs to examine a broader range of students, as well as their experiences over time and beyond college. For example, the specific experiences of high-SES students are rarely investigated. How might these students fare when faced with the additional concerns that come with the possibility of downward social mobility (Jetten, Mols, Spears, & Postmes, 2017)? Moreover, examining the impact of college experiences on subsequent outcomes, such as graduate school or the workplace, might address how consequential these college outcomes are for students' subsequent career success and lifetime well-being.

Finally, two of the described interventions have been implemented in high-ranking universities. Future work should consider whether these types of interventions are equally effective at community colleges or lower ranked universities that enroll a much higher proportion of low-SES students. A better

understanding of what makes these types of psychological interventions beneficial, and under what conditions, is crucial to increase their effective implementation across a wide variety of contexts.

#### Conclusion

As the Great Recession has increased the need to obtain a university degree, providing all students with equal chances to succeed in higher education has be-come a topic of rising interest for scholars and policymakers alike. Recently, the American government (White House Report, 2014, p.2) stated that "[Americans] need to reach, inspire, and empower every student, regardless of background, to make sure that [America] is a place where if you work hard, you have a chance to get ahead." Such meritocratic beliefs are shared and promoted in many countries (Jost & Hunyady, 2005; Pratto, Sidanius, Stallworth, & Malle, 1994; Son Hing et al., 2011), and in academic contexts in particular (Duru-Bellat & Ten- ret, 2012). In spite of this claim, and as shown in the present article, research consistently documents that in higher education meritocracy is an "unfulfillable promise" (Mijs, 2016). Indeed, the research reviewed in the present article sup- ports the idea that low-SES students not only face economic barriers but also psychological barriers to success in higher education. Thus, providing economic resources to low-SES students and facilitating their access to higher education are necessary steps for reaching more equality in higher education but are certainly not sufficient. Indeed, even if the economic obstacles are overcome, low-SES students may still experience more threat, more health problems, more negative emotions, and lower levels of motivation than their high-SES counterparts. Such "self-debilitating" motivations and behaviors (Sidanius & Pratto, 1999) may in turn produce and maintain the SES achievement gap, resulting in a vicious cycle. Thus, in addition to economic policies designed to help low-SES students to get access to universities, psychological interventions and institutional changes are a necessary and complementary way to minimize the barriers faced by low-SES students and reduce the SES-achievement gap.

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