The Role of Nonacademic Factors in College Readiness and Success

By definition, success in college means fulfilling academic requirements: a student earns a degree by taking and passing courses. Longitudinal research confirms that the best preparation for college is academic. All factors considered, prior academic achievement and cognitive ability surpass all other factors in their influence on student performance and persistence in college.

To be sure, nonacademic factors also matter, especially as they relate to academic activities. Nonacademic factors can influence academic performance, but cannot substitute for it. Relevant nonacademic factors can be classified into three groups:

1. Individual psychosocial factors, such as motivation (e.g., academic self-discipline, commitment to school) and self-regulation (e.g., emotional control, academic self-confidence)
2. Family factors, such as attitude toward education, involvement in students’ school activities, and geographic stability
3. Career planning that identifies a good fit between students’ interests and their postsecondary work

Current statistics strongly suggest that, relative to other nations, students in the United States are not as well prepared for the types of careers that the 21st-century workplace will need. On average, U.S. 15-year olds performed in the bottom 40 percent of participating countries on a recent international survey of science learning (Organisation for Economic Co-operation and Development, 2007). Nearly 25 percent of U.S. students could not demonstrate a level of science competency needed to participate in life situations related to science; students in 25 of the other 30 countries performed better.

U.S. primary- and secondary-school students spend less time studying than do their counterparts in other industrialized countries, but are more satisfied with their academic achievement (Beaton, Mullis, Martin, Gonzalez, Kelly, & Smith, 1996; Martin, Mullis, Gonzalez, Smith, & Kelly, 1999; Mullis, Martin, Beaton, Gonzalez, Kelly, & Smith, 1997, 1998). A substantial proportion of U.S. high school students assume that they will earn a bachelor’s degree, but avoid the rigorous courses in high school that they need to be successful in college (Fox, Connolly, & Snyder, 2005; Ingels, Curtin, Kaufman, Alt, & Chen, 2002; Johnson, Duffett, & Ott, 2005). Furthermore, according to ACT research, a large proportion of U.S. high school graduates enroll in postsecondary education programs then drop out; about 17 percent of adult Americans began a credit-bearing program in higher education and never finished.
ACT research confirms the foundational benefits of academic preparation for all students. Whether planning to enter college or the workforce, students who complete a rigorous core college preparatory curriculum in high school are more likely to:

- stay in high school,
- score higher on the ACT® test (by 2.5 Composite score points),
- enroll in college (by 12 percentage points),
- be prepared for credit-bearing college courses,
- not need remedial courses in college,
- achieve a first-year college grade point average (GPA) of 3.0 or higher (by 9 percentage points),
- persist in college (by 7 percentage points), and
- earn a college degree (by 8 percentage points).

ACT research also indicates that students with higher academic motivation, self-discipline, and self-confidence are more likely to earn higher college GPAs. Students with these traits, as well as those with clear academic goals, strong academic skills, college social connections, a commitment to college, and an interest in their subject matter, are more likely to persist through the third year of college.

While academic and nonacademic factors both play important roles in helping students achieve college and workforce success, the strongest predictors of college persistence and degree attainment are prior academic achievement and course selection. The figure below demonstrates that while nonacademic factors (e.g., motivation) are related to high school GPA, they are less powerful predictors of first-year college GPA than academic factors (e.g., high school GPA and ACT score). Interestingly, academic discipline—arguably the most “academic” of the nonacademic factors—influences first-year college GPA more than all other nonacademic factors combined.*

K–12 guidance counselors who are aware of the relevant nonacademic characteristics of their students can use this information to design intervention programs that support students’ academic progress. To do this, they must monitor important nonacademic indicators and apply the results to promoting student academic engagement and commitment to schoolwork.

ACT research shows that differences in college success across racial/ethnic and income groups narrow when students have the requisite academic achievement and relevant nonacademic skills. Public policy should focus primarily on the enhancement and use of resources to directly increase academic achievement. Efforts to increase nonacademic abilities should also be supported, as long as

* Nonacademic factors comprise all individual psychosocial factors that have a positive correlation with first-year college GPA; these include academic discipline, academic self-confidence, social connection, general determination, communication skills, social activity, goal striving, study skills, commitment to college, and emotional control. Family and career-development factors are not included in the model. For a detailed description of the nonacademic factors tested in the models, including those uncorrelated with first-year college GPA, see Robbins et al. (2004). For a detailed description of the data used, see Robbins, Allen, Casillas, Peterson, & Le (2006).
they help to increase student academic preparation and are targeted to those students most in need.

Educators, students, and their families, and society at large can make effective use of nonacademic student information to support student academic performance. Educators should:

- Monitor relevant nonacademic student behaviors, based on such indicators as absenteeism and missed homework assignments, and use this information to identify students who may be in academic trouble
- Intervene to encourage students to re-engage with their academic work
- Promote postsecondary goals through rigorous coursework and effective career planning

Students and their families should:

- Seek help to focus on academic work and improve academically supportive behaviors
- Seek information and support on activities that prepare students for postsecondary education, including financing, career decision-making, and relevant work and school experiences

Society at large should:

- Place the highest priority on academic achievement and signal clearly to students and families that academic achievement is essential to the economic well-being of every individual, each state, and the country as a whole

Success in college means fulfilling academic requirements. There are no shortcuts to academic success. We should all be focused on helping our students become academically prepared, primarily through direct academic interventions, and secondarily through cultivation of the nonacademic factors that support academic achievement.
References and Data Sources

ACT. (2004). Crisis at the core: Preparing all students for college and work. Iowa City, IA: Author.
ACT. (2007). Effective use of EPAS helps those students who need help the most. Iowa City, IA: Author.
