

Linking Research and Resources for Better High Schools

Easing the Transition to High School: Research and Best Practices Designed to Support High School Learning





These materials are offered by the National High School Center, a central source of information and expertise on high school improvement issues that does not endorse any interventions or conduct field studies. Funded by the U.S. Department of Education, the National High School Center serves the Regional Comprehensive Centers in their work to build the capacity of states across the nation to effectively implement the goals of No Child Left Behind relating to high schools. The National High School Center is housed at the American Institutes for Research and partners with other leading education research organizations such as Learning Point Associates, MDRC, WestEd, and the National Center for Educational Accountability (NCEA), the organization responsible for the primary authorship of this report. The contents of this report were developed under a grant from the U.S. Department of Education. However, those contents do not necessarily represent the policy of the U.S. Department of Education, and you should not assume endorsement by the Federal Government.



Easing the Transition to High School: Research and Best Practices Designed to Support High School Learning

PREPARED BY THE NATIONAL HIGH SCHOOL CENTER

REPORT EDITORS

Louise Kennelly Maggie Monrad

National High School Center at the American Institutes for Research

CONTENTS

betterhighschools.org

Contents

Introduction	ii
The First Year of High School: A Quick Stats Fact Sheet by Elizabeth Williams and Scott Richman, AIR	1
Policy Brief: State and District-Level Support for Successful Transitions Into High School by Corinne Herlihy, MDRC	5
Issue Brief: Toward Ensuring a Smooth Transition Into High School by Corinne Herlihy, MDRC	17
Snapshot: Managing the Transition to Ninth Grade in a Comprehensive Urban High School by Thomas J. Smith, MDRC	31



INTRODUCTION TO NATIONAL HIGH SCHOOL CENTER RESOURCES ON THE TRANSITION INTO HIGH SCHOOL

The transition from middle school to high school represents a significant event in the lives of adolescents, one that necessitates support from and collaboration among teachers, parents, counselors, and administrators at both educational levels. Successful transitions place particular emphasis on ninth-grade initiatives and can create one of strongest bridges from middle to high school and beyond. This toolkit contains four resources—a fact sheet, policy brief, research brief, and snapshot—on how to support and guide a smooth transition into high school:

- The First Year of High School, a quick stats fact sheet on the ninth grade bulge, demonstrates that a disproportionate number of ninth graders are held back in the ninth grade, many of whom drop out by tenth grade.
- State and District-Level Support for Successful Transitions Into High School, a policy brief, examines how some states and districts are easing the transition to ninth grade.
- Toward Ensuring a Smooth Transition Into High School, an issue brief, offers a best practices brief based on key research in the field of ninth grade transitions.
- *Managing the Transition to High School in a Comprehensive Urban Environment* provides a snapshot of how one schools is managing to make a positive difference for ninth graders.

The First Year of High School: A Quick Stats Fact Sheet





The First Year of High School: A Quick Stats Fact Sheet

by Elizabeth Williams and Scott Richman, AIR

Students' experiences in their first year of high school often determine their success throughout high school and beyond. However, more students fail ninth grade than any other grade.

Students who are promoted to tenth grade, but who are off track—as indicated by failed grades, a lack of course credits or a lack of attendance during their ninth-grade gateway year—may have already missed the opportunity to get on a graduation track.

STATISTICS

The following statistics highlight a noticeable trend in the lack of progress of many students throughout freshman year. Many students are held back in ninth grade—creating what is known as the *ninth grade bulge*—and drop out by tenth grade—contributing to the *tenth grade dip*.

• Students in ninth grade comprise the highest percentage of the overall high school population because students in disproportionate numbers are failing to be promoted out of ninth grade. Promotion rates between ninth and tenth grade are much lower than rates between other grades (Wheelock & Miao, 2005).

Student Enrollment by Grade and Percentage of Total Enrollment, 2004–2005					
8th	9th	10th	11th	12th	Total
3,824,670	4,281,345	3,750,491	3,369,339	3,094,349	18,320,194
20.9%	23.4%	20.5%	18.4%	16.9%	100.0%

(Gray, Sable, & Sietsema, 2006)

- The ninth grade bulge is illustrated by the following numbers: enrollment figures show 4.19 million students enrolled in grade nine during the 2003–2004 school year, while figures for the following school year, 2004–2005, show enrollment numbers for tenth grade at around 3.75 million—a loss of 10.5% (NCES, 2005). The dip in the number of students in tenth grade reflects both the large number of students not promoted to tenth grade as well as those students that drop out after ninth grade and before tenth grade.
- In the last 30 years, the bulge of students in grade nine has more than tripled, from approximately 4% to 13% (Haney et al., 2004).
- Researchers at Johns Hopkins University found that up to 40% of ninth grade students in cities with the highest dropout rates repeat the ninth grade, but only 10–15% of those repeaters go on to graduate (Balfanz & Letgers, 2004).
- Ninth grade attrition is far more pronounced in urban, high-poverty schools: 40% of dropouts in low-income high schools left after ninth grade, compared to 27% in low poverty districts (EPE Research Center, 2006).
- Racial disparities highlight the ninth grade bulge and tenth grade dip—these figures are the most pronounced for African American and Latino students. For example, grade nine enrollment is 23–27% higher than grade

eight, and attrition between grades nine and ten hovers around 20% for African American students; for their white peers, grade nine enrollment is 6-8% higher than grade eight, while attrition between grades nine and ten is stable around 7% (Wheelock & Miao, 2005).

- Twenty-nine of 51 states see their greatest "leakage" in the "education pipeline" occur during the ninth grade (EPE Research Center, 2006). Some states have as high as a 20% decrease in enrollment between ninth and tenth grades (Wheelock and Miao, 2005).
- Most high school dropouts fail at least 25% of their ninth grade courses, while 8% of high school completers experienced the same difficulty (Letgers & Kerr, 2001).
- More than one semester "F" in core subjects and fewer than five full course credits by the end of freshman year are key indicators that a student is not on track to graduate (Allensworth & Easton, 2005). Low attendance during the first 30 days of the ninth grade year is a stronger indicator that a student will drop out than any other eighth grade predictor, including test scores, other academic achievement, and age (Jerald, 2006).

STRATEGIES

Because the research is clear that the first year of high school is pivotal, but the transition into high school is often characterized as a time when students experience a decline in grades and attendance (Barone, Aguirre-Deandreis, & Trickett, 1991), school systems must support first year high school students to improve their chances of success.

- One strategy to address the challenges facing freshmen is the creation of ninth grade academies that are apart
 from the rest of the high school or the creation of separate stand alone schools (Reents, 2002). One hundred
 fifty-four ninth-grade-only schools were operating during the 2004-2005 school year (NCES, Common Core of
 Data).¹
- In schools in which transition programs are fully operational, researchers saw a dropout rate of 8%, while schools without transition programs averaged 24% (Reents, 2002).
- Student self-reports indicate that more transition support that would ease their transition to high school could
 help. Compared to their perceptions reported the previous year, ninth graders perceive less support and monitoring from teachers and principals and generally like school less than they did in middle school. On average, ninth
 graders report being less involved in school activities and perceive the need for more school organization. They
 also indicate lower self-esteem and higher rates of depression than middle school students (Barber & Olsen,
 2004).

Many research-based practices and policies are available to states, districts, and schools committed to supporting and guiding smooth transitions into high school. Resources and strategies include aligned standards and curriculum, team teaching, catch-up coursework in the first semester using the double block schedule, student advisories, at-risk benchmarks, academic benchmarks, and adolescent literacy initiatives.

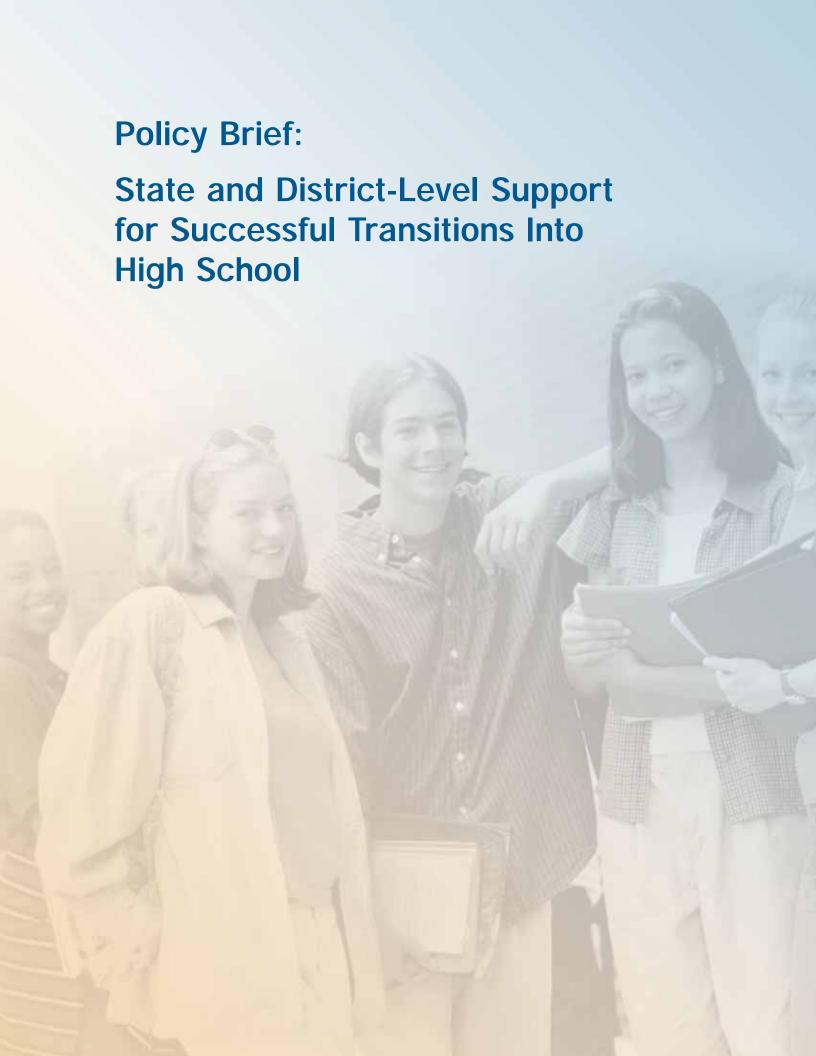
END NOTE

This statistic reflects the total number of public schools operating in the United States that offered only the ninth grade, but is not necessarily reflective of the total number of "ninth grade academies."



REFERENCES

- Allensworth, E. M. & Easton, J. Q. (2005). *The on-track indicator as a predictor of high school graduation, Chicago:*Consortium on Chicago school research. Retrieved March 9, 2007 from http://ccsr.uchicago.edu/publications/p78.pdf
- Balfanz, R., & Letgers, N. (2004). Locating the dropout crisis: Which high schools produce the nation's dropouts, where are they located, who attends them? Baltimore, MD: Center for Research on the Education of Students Placed At-Risk, Johns Hopkins University. Retrieved March 9, 2007 from http://web.jhu.edu/CSOS/graduation-gap/edweek/Crisis_Commentary.pdf
- Barber, B. K., & Olsen, J. A. (2004). Assessing the transitions to middle and high school. *Journal of Adolescent Research* 19(3). Retrieved March 9, 2007 from http://jar.sagepub.com/cgi/content/abstract/19/1/3
- Barone, C., Aguirre-Deandreis, A. I., & Trickett, E. J. (1991). Means—ends problem-solving skills, life stress, and social support as mediators of adjustment in the normative transition to high school. *American Journal of Community Psychology* 19(2), 207–225.
- EPE Research Center. (2006, June 22). Diplomas count: An essential guide to graduation rates and policies. *EdWeek*. Retrieved March 9, 2007 from http://www.edweek.org/ew/toc/2006/06/22/index.html
- Gray, D., Sable, J., & Sietsema, J. (2006). *Documentation for the common core of data state nonfiscal survey of public elementary/secondary education: School year 2004–05* (NCES 2006-441). Washington, DC: National Center for Education Statistics, U.S. Department of Education.
- Haney, W., et al. (2004). *The education pipeline in the United States 1970–2000*. Chestnut Hill, MA: The National Board on Educational Testing and Public Policy. Retrieved March 9, 2007 from http://www.bc.edu/research/nbetpp/statements/nbr3.pdf
- Jerald, C. D. (2006). *Identifying potential dropouts: Key lessons for building an early warning data system—A dual agenda of high standards and high graduation rates.* Washington, DC: Achieve, Inc. Retrieved March 9, 2007 from http://www.achieve.org/files/FINAL-dropouts_0.pdf
- Letgers, N., & Kerr, K. (2001). Easing the transition to high school: An investigation of reform practices to promote ninth grade success. Baltimore, MD: Center for Social Organization of Schools, Johns Hopkins University. Retrieved March 9, 2007 from http://www.civilrightsproject.harvard.edu/research/dropouts/legters.pdf
- National Center for Educational Statistics. (2005). *Digest of education statistics tables and figures 2004*. Washington, DC: Author. Available online at http://nces.ed.gov/programs/digest/d05/tables/dt05_097.asp
- National Center for Education Statistics: Common Core of Data. (n.d.). Retrieved March 9, 2007 from http://nces.ed.gov/ccd/bat/result.asp?saved=3357
- Reents, J. N. (2002). Isolating 9th graders: Separate schools ease the academic and social transition for high-school bound students. *The School Administrator*. Retrieved March 9, 2007 from http://www.aasa.org/publications/saarticledetail.cfm?ItemNumber=2668
- Wheelock, A., & Miao, J. (2005). The ninth grade bottleneck. *The School Administrator*. Retrieved March 9, 2007 from http://www.aasa.org/publications/saarticledetail.cfm?mnitemnumber=&tnitemnumber=&titemnumber= 988&unitemnumber=&pf=1&snitemnumber=







State and District-Level Support for Successful Transitions Into High School

by Corinne Herlihy, MDRC

INTRODUCTION

The transition into high school is a critical point in the educational pipeline, and ninth-grade can be characterized as one of its leakiest junctures. MDRC's research in four urban districts suggests that as many as 40 percent of students fail to get promoted from ninth- to 10th-grade on time, and fewer than 20 percent of those students recover from failure and go on to graduate (Kemple, Herlihy, & Smith, 2005). Nationally, a recent study of public school enrollment patterns shows that (1) there is a sharp increase in the number of students enrolled in ninth-grade over the last 30 years, indicating that an increasing number of students are being retained, and (2) the rate at which students disappear between ninth- and 10th-grade has tripled over the same time period (Haney, 2004).

Clearly, the transition into high school is difficult for many students. However, it is usually the end result of unsuccessful transitions—high dropout rates, low on-time graduation rates, and low achievement—that receive the most attention. This policy brief focuses on five key challenges that states, districts and schools should address to support a successful transition into high school, particularly for students who are at high risk of failure:

- Establish a data and monitoring system that will both diagnose why students are struggling and be used to hold schools and districts accountable;
- Address the instructional needs of students who enter high school unprepared for rigorous, college preparatory work;
- Personalize the learning environment to lower the sense of anonymity and address individual needs;
- Build capacity within the faculty and school leadership in low-performing schools to address diverse student needs; and
- Create connections to the community, employers, and institutes of higher education to better engage students and help them see the relevance of their coursework.

Examples of the ways in which states and districts have addressed each of these challenges are highlighted throughout the brief. These examples do not represent a full survey of such initiatives, and it should also be noted that most have not been rigorously evaluated for effectiveness. In fact, research on the high school transition is limited; however, the policies and practices featured below are all consistent with programs that *do* have evidence of effectiveness at the school level.

THE CONTEXT

In the last five years, educators and policymakers—including federal agencies, governors, and foundation and business leaders—have recommitted themselves to addressing the challenge of reforming secondary education, particularly low-performing schools. The No Child Left Behind (NCLB) Act of 2001 placed a new focus on K–12 student achievement. Graduation rates and measures of high school student proficiency in reading and math are factored into state-defined standards for "adequate yearly progress" under NCLB. The upcoming reauthorization of NCLB promises to put even greater focus on high schools. While launching the new priorities for NCLB this month, U.S. Secretary of Education Margaret Spellings stated, "The national consensus for high school reform has never been stronger" (U.S. Department of Education, 2007).

KEY CHALLENGES AND POLICIES

A substantial review of the research literature documents the fact that the transition into high school is marked by increased disengagement and declining motivation among students, which in turn, predict subsequent school failure and dropout (Kemple et al., 2005). Unfortunately, few rigorous studies provide evidence to support students at this critical time. Still, many schools, districts and states have developed programs and policies to address the challenges faced by students transitioning into high school.

Challenge 1: Establish Monitoring and Accountability Systems

There are few systematic measures of the challenges associated with transitioning into high school. State-reported dropout statistics are often unreliable, and most states do not regularly report grade-retention data (Haney, 2004). While many states have begun to adopt common methodologies for measuring graduation rates, few states, districts, or even schools have developed monitoring systems that will identify students who are "off track" early in their high school careers—or better yet, identify those whose performance in middle school indicates high risk for school dropout. Below are examples of several promising initiatives at the state and district levels.

State Initiatives

• Statewide Longitudinal Data Systems

States that create longitudinal data systems can develop the information needed to diagnose transition problems and hold schools and districts accountable for student outcomes related to the transition into high school—for example, on-time promotion and course credit attainment. The Data Quality Campaign (www.dataqualitycampaign.org), a national collaborative, has developed guidelines for states that will help create system that can answer questions like "What achievement levels in middle school indicate that a student is on track to succeed in rigorous courses in high school?" While only five states currently report having data systems capable of answering this question, 42 states report the creation of unique student identifiers (an integral part of a longitudinal data system that tracks students over time), and 26 states indicate that they have or are working on building data warehouses¹. Florida's data warehouse is considered the most extensive in the country. The Florida K–20 Education Data Warehouse provides stakeholders in public education with the capability to receive timely, efficient, consistent responses to inquiries into Florida's kindergarten through university education.

Indiana

In Indiana, House Bill 1347, enacted by the 2006 legislature, requires that high schools report annually the number of freshmen not earning enough credits to become sophomores—a first step toward identifying those at highest risk of dropping out, which is critical for planning focused dropout prevention activities.

District Initiatives

School districts in Chicago and Philadelphia are using similar data to identify students who need extra support and are developing interventions to get them back on track for graduation:

Chicago Public Schools and the Consortium on Chicago School Research

Chicago Public Schools (CPS) have integrated a ninth-grade "on-track" indicator into their accountability system in an effort to help high schools focus on students in need of intervention. The indicator, developed by researchers at the Chicago Consortium on School Research, uses students' class credits and failures as predictors of their probability of graduating on time. For example, a freshman student must pass five full-year courses and receive no more than one "F" in order to be deemed "on track." It has been relatively easy for schools to use the



indicator, since information regarding students' course credits is readily available within schools. The Consortium reports that use of the "on-track" indicator in CPS has been successful: "from the 1994–1995 to 2003–2004 school years, on-track rates have increased 10 percentage points, from 48 to 58 percent of students on track" (Allensworth & Easton, 2005).

• School District of Philadelphia and the Philadelphia Education Fund

A study produced by the Philadelphia Education Fund (PEF), which followed sixth-graders in the School District of Philadelphia for seven years (from the 1996–1997 to 2003–2004 school years), identified four factors that were strong predictors of student becoming off track in high school—low attendance, poor behavior marks, failing math, and failing English. When a sixth-grader exhibited even one of these factors, his or her chance of graduating from high school on time decreased severely. Based on the findings, PEF has awarded "Innovation Continuation Grants" to nine middle-grade schools in Philadelphia to reduce these risk factors in their students. Researchers will monitor student outcomes to gauge the success of these grants, which will then assist schools to develop effective means of targeting their at-risk students (Herzog & Balfanz, 2006).

Challenge 2: Address Diverse Instructional Needs of Incoming High School Students

Rigor is one of the "new three R's" of recent high school reform efforts—rigor, relevance and relationships. Across states, the push for more rigorous coursework, higher graduation requirements, and graduation exams has generated concern for students who enter high school poorly prepared for college prep courses. And, there is good reason to be concerned. Nationally, fewer than 30 percent of eighth-graders scored proficient on the 2005 NAEP mathematics or reading tests (Education Week, 2007). Even when achievement is measured by local standards, most states have at least one-quarter of their students entering high schools with scores below proficient in math and/or reading on eighth-grade assessments (Education Week, 2006). In addition, there is great variation within states and even within districts. For example, in Philadelphia, only the city's magnet high schools had 80 percent or more of their incoming ninth-graders reading and doing math at a seventh-grade level. In contrast, the majority of its neighborhood high schools had entering freshmen classes in which less than one-third of the students did as well on both math and reading (Neild & Balfanz, 2001).

High schools must meet the diverse needs of students, many of whom need extra support to get caught up to at least grade level in reading and math. Traditional remedial classes do not work if they are not designed to "accelerate" learning, so students are ready to do college prep work early in their high school careers. Otherwise, students do not have enough time to get caught up and end up frustrated by their poor preparation and disengaged by remedial content.

State Initiatives

Virginia's Algebra Readiness Initiative

The state of Virginia authorized funding in 2001 to provide matching funds to districts to conduct interventions for students in grades six to nine who are at risk of failing the state's algebra exam at the end of ninth-grade. Students within participating districts are identified through a computer-adaptive diagnostic test, which the state has made available to all school districts. The intervention includes $2\frac{1}{2}$ additional hours of services per week and a 10-to-1 student-to-teacher ratio for each program. Apart from these requirements, each district may decide on its own intervention model and whether it meets afterschool, before school, or in the summer. The state funding also requires that a posttest be given which will allow the state to track the students' gains and research the effects of the incentive funding.

District Initiatives

Talent Development's specialized curricula in districts across the country

Districts and schools across the country are implementing the Talent Development High School (TDHS) model (Kemple, Herlihy, & Smith, 2005). The academic centerpiece of the TDHS is the combination of extended block scheduling, double-dosing of key subjects, and specialized curricula in ninth-grade. The Talent Development curriculum was designed to let students catch up from low performance levels commonly found when they entered high school in the ninth-grade—two or more years below grade expectancy. During the first semester, ninth-grade students take two "catch-up courses"—Transition to Advanced Mathematics and Strategic Reading. These courses are designed to enhance the skills of incoming freshmen and enable them to succeed in traditional ninth-grade algebra and English in the second semester. Additionally, ninth-grade students take a third Talent Development course, called Freshman Seminar, which combines study skills, personal goal-setting, and social group skills designed to prepare students more broadly for the demands of high school. A rigorous study of TDHS in five Philadelphia high schools found that it produced substantial gains in attendance, academic course credits earned (especially in algebra), and promotion rates during students' first year of high school (Kemple, Herlihy, & Smith, 2005). Districts implementing this approach include Kansas City, MO; Chicago, IL; and Chattanooga, TN.

Challenge 3: Personalize the Learning Environment

High schools are typically larger and more bureaucratic than elementary and middle schools, leading to depersonalization and a noncommunal climate (Lee & Smith, 2001). In a recent survey of young people who left high school without graduating, nearly half (47 percent) reported being bored or disengaged from high school. Thirty-eight percent believed that they had "too much freedom" and not enough rules (Bridgeland et al., 2006). It is easy for ninth-graders to get lost in the shuffle, skip school without consequence, or quietly fail without any concerted intervention by the school. There are many examples of interventions designed to personalize the high school environment. Some are structural, such as creating small learning communities or small schools; and some programs increase opportunities for adult/student interactions, making adults responsible for individual students who might otherwise fall through the cracks.

State Initiatives

Georgia's Graduation Coaches—An Approach to Personalization

As part of a \$1 billion increase in Georgia's investment in education, the state has implemented an initiative that puts a graduation coach in every public high school. These coaches work with students in grades eight to 12 whom they deem at risk of dropping out of high school and connect them with outside agencies and programs, if necessary. For example, graduation coaches link students with community mentors, create individualized graduation plans for students, and develop credit-recovery programs. Graduation coaches are trained by a partnership between a national organization, Communities in Schools, and the Georgia Department of Education, to identify at-risk students, to understand the landscape of community and school organizations, and to use different techniques to target their student population (e.g., case management, group activities, etc.).

District Initiatives

Small Learning Communities

Small learning communities (SLCs) are a way to organize high schools into smaller units. Generally, an SLC includes an interdisciplinary team of teachers who share a few hundred or fewer students in common for instruction. Teachers assume responsibility for the educational progress of students in their SLC across several years of





school, working together to meet the needs of each student. SLCs have emerged as one of the most common and potentially effective school reform strategies. They are a key component of several comprehensive school reform models—including Talent Development, which includes an independent SLC for freshmen that feeds into upper-grade career academies; and First Things First, which establishes four-year thematic SLCs. Research has shown that SLCs may enhance student engagement and success in school, serving as a platform for supporting other needed instructional and curricular reforms (Kemple, Connell, Klem, Legters, & Eccles, 2005).

The Northwest Regional Education Laboratory (NWREL) provides resources, services and tips for developing small learning communities and restructuring secondary schools (http://www.nwrel.org/scpd/sslc/). NWREL supports all grantees of the U.S. Department of Education's SLC program via project director meetings, regional implementation workshops, technical assistance, online tutorials, and a resource warehouse. It can also provide more intensive assistance by helping schools connect to practitioner advisors or by designing district-specific workshops and/or follow-up coaching. These services are being provided to such districts as Miami-Dade, FL; Atlanta, GA; and Memphis, TN.

Check and Connect

Check and Connect is a dropout prevention program for high school students with learning, emotional and behavioral disabilities, which was developed by a team of researchers at the Institute on Community Integration, University of Minnesota, in a partnership with parents and teachers within an urban school system. The program begins in the ninth-grade, when students are assigned a mentor who works with them year round to track their attendance, behavior and academic progress. The effects of Check and Connect have been evaluated in two different random-assignment studies, which both found students in the program had increases in the numbers of credits earned, as well as in attendance and enrollment rates (Sinclair et al., 1998; Sinclair et al., 2005). The Check and Connect model is currently being implemented in both urban and suburban school districts and is undergoing further rigorous research to evaluate its effects on truancy and on students with special needs.

Minneapolis Public Schools are using Check and Connect as a high school completion initiative; Dakota County, MN, has used Check and Connect to target chronically truant youth (ages 11 to 17) with and without disabilities across eight suburban/small city school districts; and the program has been used as a dropout prevention intervention for middle-school students with learning and emotional/behavioral disabilities.

Challenge 4: Build Capacity in Low-Performing Schools

Nationwide, low income and minority students are more likely to have teachers who are uncertified in their field or who lack a major or minor in the subject area that they teach (Education Trust, 2000). Within large urban districts, students in the highest-poverty schools are more likely to have teachers with less experience and who lack certification (Philadelphia Education Fund, 2002). Within schools, students in lower-ability classes are less likely to have teachers with appropriate certification (Education Trust, 2000). There is also evidence that ninth-graders, particularly in low-performing high schools, are more likely to have less experienced and less qualified teachers in their core academic courses than students in upper grades (Neild, 2003).

The inability to attract and retain experienced, qualified teachers is a clear barrier to improving student performance in low-performing schools, particularly for ninth-grade students. With the increased stresses and difficulties of the work environment in low-performing schools, extra incentives need to be given to attract teachers to these areas.

Some states and districts have taken steps to attract highly qualified teachers to the needlest schools and to teach the students who need them most, especially students making the transition into high school. Some of the practices are identified below.

State Initiatives

• California: Loan repayment in high-need schools and subject areas

The state of California offers the Assumption Program of Loans for Education, which repays up to \$11,000 in outstanding educational loan balances for teachers in return for four consecutive years of full-time eligible teaching service in California public schools, grades K to 12. Participants must agree to teach in a California public school in a designated subject matter area or in a school that meets criteria specified by the Superintendent of Public Instruction. An additional \$8,000 of loan forgiveness (up to \$19,000 total) is available to candidates providing teaching service in mathematics, science, or special education and in very-low-performing schools.

• California and New York: Incentives for National Board-certified teachers in high-need schools

The National Board for Professional Teaching Standards (NBPTS) established a rigorous certification process
that requires teachers with at least three years of experience to pass a qualification process, including both a written test and a portfolio of evidence showing their teaching skill. A large-scale study showed that board-certified
teachers have a greater impact on student achievement than teachers without board certifications and than teachers who seek board certifications but do not earn them. The largest impacts were seen for low-income students
(Goldhaber & Anthony, 2004).

While many states and school districts offer financial support to teachers who work toward board certification, and many provide salary bonuses for teachers who pass, few target these incentives in ways that support low-performing schools or particular grade levels. Two exceptions are California and New York. In California, NBPTS-certified teachers who work full time in low-performing schools receive a \$20,000 bonus that is paid out over four years. In New York, board-certified teachers who teach in low-performing schools and mentor new teachers receive annual bonuses of \$10,000 for three years. Both of these incentives are larger than those offered in most other states, and teachers are eligible only if they work in low-performing schools.

Both California's loan forgiveness program and the NBPTS certification initiatives in California and New York provide extra incentives for teachers who work in low-performing schools or in high-need subject areas. Neither specifically targets ninth-grade within these schools or ninth-grade instruction within critical content areas, but such a strategy might be effectively targeted in that fashion. In addition, districts and schools could intentionally allocate the most experienced and effective teachers to ninth-grade in low-performing schools—with or without a formal incentive program.

Challenge 5: Create Connections to the Community, Employers and Higher Education

Many high schools are isolated from other institutions in their communities and have limited contact with students' families. Little effort is made to use the community as a resource for providing students with meaningful learning opportunities and for highlighting the potential relevance of what students are studying. As a result, some students become disengaged from school, are not motivated to work hard, and ultimately fail to progress through high school. In a recent survey of high school dropouts, seventy-five percent of ninth- and 10th-grade dropouts surveyed said they were not motivated or inspired to work hard. Eighty-one percent of respondents said that if schools provided opportunities for real-world learning, it would have improved their chances of graduating from high school (Bridgeland et al., 2006). There is some empirical evidence to support this view as well.





State Initiatives

South Carolina's Career Guidance Model

The South Carolina Education and Economic Development Act of 2005 requires that "the Department of Education develop a curriculum, aligned with state content standards, organized around a career cluster system that must provide students with both strong academics and real-world problem-solving skills. Students must be provided individualized educational, academic, and career-oriented choices and greater exposure to career information and opportunities" (South Carolina Education & Economic Development Act (EEDA), 2005). As a result, the South Carolina Career Guidance Model was developed to assist students and their parents, school districts and communities to engage students in career awareness in elementary school, career exploration in middle and high school, and career exploration in high school. This system involves parents, teachers and school counselors assisting students set educational and career goals and developing individual graduation plans to achieve these goals. High school students are provided guidance and curricula that will enable them to complete successfully their individual graduation plans, preparing them for a seamless transition to relevant employment, further training or postsecondary study.

District Initiatives

Career Academy Model

Career Academies have existed for more than 30 years, and they can now be found in an estimated 1,500 high schools nationwide. Career Academies consist of small learning communities and combine academic and career-related courses in an effort to enhance both the rigor and relevance of the high school curriculum. Career Academies form partnerships with local employers to expand students' exposure to career options and skill requirements and to provide them with work-based learning experiences. A rigorous evaluation of Career Academies by MDRC reported that, for the sample of youth most at risk of dropping out of high school, Career Academies increased the likelihood of staying in school through the end of the 12th-grade year, improved attendance, and increased the number of credits earned toward graduation. For students at medium or low risk of dropping out, the Academies increased career and technical course-taking and participation in career development activities without reducing academic course-taking. For all groups, Academies had little or no impact on graduation rates, which were relatively high for both Academy and non-Academy groups in the study (Kemple & Snipes, 2000; Kemple & Scott-Clayton, 2004).

BOTTOM LINE

The state and district initiatives highlighted in this brief are a small subset of the programs underway to support the transition for students into high school. These promising programs focus on data to identify early those students who veer off the road to graduation, to address the needs of students who leave middle school unprepared for high school work, to personalize the high school experience, to find skilled teachers to work with ninth-graders, and to help students see how the transition into high school connects to the transition to college and work. However, these initiatives do not address all the challenges associated with the transition into ninth-grade, and, therefore, most do not work as stand-alone strategies. Many programs will need to work in conjunction with other initiatives or serve as platforms for more comprehensive secondary school reforms. The needs of ninth-grade students are multidimensional, and efforts to support their transition must be as well.

The strength of the evidence for effectiveness regarding programs and strategies varies. Career Academies and Check and Connect, for example, have been evaluated with the most rigorous methodology, using random assignment. Other approaches have strong evidence in one district—Talent Development in Philadelphia and the "On-Track"

indicator in Chicago. Some are examples of legislation whose effect has not yet been measured—Indiana's data reporting requirements and South Carolina's guidance system. In all cases, it is clear that rigorously studying these types of interventions will help to inform state and district policy decisions.

Schools and districts can learn from one another, and the state may play the role of convener to help facilitate collaboration and training. States can also provide incentives for schools and districts to undertake programs to support successful transitions, as well as contribute resources for implementation, and for monitoring and evaluation. Scaling up these strategies across schools and districts is difficult. States can provide support—financial and personnel—for researching which programs are the best fit and for developing a comprehensive plan to ease the transition into high school.



ADDITIONAL RESOURCES

Determining Early Which Students Are Most Likely to Dropout

There are readily accessible indicators that schools can use to identify as early as ninth-grade which students are on track to graduate and which will most likely drop out in time to intervene and prevent it. These same powerful indicators show the areas in which these students need supports. The on-track measures for ninth-graders by the end of Freshman year developed by the Chicago Consortium for School Research, include the following:

- The student has accumulated five full course credits, the number often needed to be promoted to 10th-grade.
- The student has no more than one semester F (that is, one-half of a full credit) in a core subject (English, math, science, or social studies) (Allensworth & Easton, 2005).

In terms of measurement, the criteria differ in two key ways: (1) course failures are counted only for core courses, while credit accumulation includes all credit-bearing classes; and (2) failures are counted by semester, while credit accumulation is measured in terms of full-year credits, with half credits given for each semester course. Thus, the on-track indicator combines two separate but related factors: number of credits earned and number of Fs in core subjects.

First-time Freshman On or Off Track by Credits Earned and Number of Fs (5 full core course credits and no more than $1\ F=0$ n Track)				
	Number of Semester F's in core courses Number of Credits Accumula Freshman Year			
	1 semester course =.5 credits	1 full course = 1 credit		
Student 1				
Student 2				
Student 3				

States can develop robust data systems that allow districts to upload this student-level information gathered from schools in a uniform and coherent manner, allowing them to see quickly and clearly where the greatest need for deployment of resources and targeted intervention rests.

END NOTE

A data warehouse is, at the least, a repository of data concerning students in the public education system; ideally, it also includes information about educational facilities and curriculum and staff involved in instructional activities, as well as district and school finances. Data warehouses link student records over time and across database in a timely manner and allow for efficient use and reporting of data.

REFERENCES

- Allensworth, E., & Easton, J. (2005). *The on-track indicator as a predictor of high school graduation.* Chicago: Consortium on Chicago School Research.
- Bridgeland, J., Dilulio, J. J., & Morison, K. B. (2006). *The silent epidemic: perspectives of high school dropouts.* Washington, DC: Civic Enterprises.
- Education Trust. (2000). Honor in the boxcar: equalizing teacher quality. Washington, DC: Education Trust.
- Education Week. (2007). *Quality counts 2007: from the cradle to career: connecting American education from birth through adulthood.* Bethesda, MD: Education Week.
- Education Week. (2006). *Quality counts 2006: a decade of standards-based education* (p. 79). Bethesda, MD: Education Week.
- Goldhaber, D., & Anthony, E. (2004). Can teacher quality be effectively assessed? Washington, DC: Urban Institute.
- Haney, W., et al. (2004). *The education pipeline in the United States, 1970-2000.* Boston: Boston College, Lynch School of Education.
- Herzog, L., & Balfanz, R. (2006). *Middle grades students on track to graduation*. Philadelphia: Philadelphia Education Fund.
- Kemple, J., Herlihy, C., & Smith, T. J. (2005). *Making progress toward graduation: evidence from the talent development high school model.* New York: MDRC.
- Kemple, J., & Scott-Clayton, J. (2004). *Career Academies: impacts on labor market outcomes and educational attainment.* New York: MDRC.
- Kemple, J., & Snipes, J. C. (2000). *Career Academies: impacts on students' engagement and performance in high school.* New York: MDRC.
- Kemple, J., Connell, J., Klem, A., Legters, N., & Eccles, J. (2005). *Making the move: how freshman academies and thematic small learning communities can support successful transitions to and through high school.* Washington, DC: Office of Vocational and Adult Education and U.S. Department of Education.
- Lee, V.E., & Smith, J. (2001). *Restructuring high schools for equity and excellence: What works.* New York: Teachers College Press.
- Neild, R. (2003). *Ninth grade teacher qualifications and turnover in an urban district.* Philadelphia: University of Pennsylvania. Paper presented at the annual meeting of the American Educational Research Association, Chicago, IL.
- Neild, R. C., & Balfanz, R. (2001). *An extreme degree of difficulty: the educational demographics of the ninth grade in Philadelphia.* Baltimore: Johns Hopkins University, Center for Social Organization of Schools.



- Philadelphia Education Fund. (2002). *Teacher staffing in the school district of Philadelphia: a report to the community.* Philadelphia: Philadelphia Education Fund.
- Sinclair, M., Christenson, S., Evelo, D., & Hurley, C. (1998). Dropout prevention for youth with disabilities: efficacy of a sustained school engagement procedure. *Exceptional Children, 65*(1), 7–21.
- Sinclair, M., Christenson, S., & Thurow, M. (2005). Promoting school completion of urban secondary youth with emotional or behavioral disabilities. *Exceptional Children*, 71(4), 465–482.
- *South Carolina Education and Economic Development Act* (EEDA). (2005). Retrieved April 24, 2007, from http://www.che.sc.gov/AcademicAffairs/EEDA/EEDA.htm
- U.S. Department of Education. (2004, January 24). Secretary Spellings Launches Priorities for NCLB Reauthorization. [Press Release]. Retrieved April 24, 2007, from http://www.ed.gov/news/pressreleases/2007/01/01242007.html

State Resources

Florida's K-20 Education Data Warehouse. Web site: http://edwapp.doe.state.fl.us/doe/

Georgia's Graduation Coaches. Web site:

http://public.doe.k12.ga.us/pea_communications.aspx?ViewMode=1&obj=1269 http://gadoe.org/tss school improve.aspx?PageReq=TSSGraduationCoach

South Carolina Career Guidance Model. Web site:

http://www.carolinacareers.org/cgm/main/IntroOverview.html?CFID=22111120&CFTOKEN=208cc055b7ea41b8-70838262-DDD9-668F-1F5420EBCEAD67F1&jsessionid=503019aa4004541d1d31TR5030

Virginia's Algebra Readiness Initiative. Web site:

http://www.pen.k12.va.us/VDOE/Instruction/Math/ARI/ari-faq.shtml#1

Issue Brief:

Toward Ensuring a Smooth Transition Into High School





May 2007

At-a-Glance

Toward Ensuring a Smooth Transition Into High School

by Corinne Herlihy, MDRC

KEY ISSUE

Supporting a smooth transition to high school requires allowing struggling students to catch up while also ensuring they are challenged and engaged in learning.

Primary Findings

Transitions into high school can be eased when both structural and specialized curricula reforms are in place.

TAKE-AWAYS

State Level

- Identify and disseminate readiness indicators for high-school-level work along with benchmarking tools, such as checklists and guidelines, for high schools to use to determine who needs extra support.
- Gather information from high schools regarding how many incoming ninth graders are not yet prepared to take college-prep English and math, and track progress of how many students are ready each year.
- Provide guidelines on how to offer double-doses of catch-up courses—courses that boost struggling ninth-grade students' skills in reading and mathematics—in the first semester of high school

INTRODUCTION

The transition into high school is a critical juncture for students—a time when they move from often smaller and more supportive middle schools to larger high schools, where the academic and social demands are higher. The cost of failing to make this transition successfully is high for students and for the schools that serve them. Unsuccessful high school transitions contribute to high dropout rates, low on-time graduation rates, and low achievement in American high schools. Therefore, it is vital to identify what works to ensure that all students make it through this important gateway.

This issue brief draws on two studies of high school reform models conducted by MDRC, a nonpartisan, nonprofit research organization, which shed light on promising strategies to support ninth-grade students. Increasing the capacity of high schools to provide extra help for ninth-grade students to catch up, to learn to read well, and to earn credits in English and algebra is critical, as these academic achievements are key predictors of whether students are likely to graduate on time (Quint, 2006).

THE CHALLENGE

Although moving from middle school to high school can be a very exciting time for students, the transition is filled with great anxiety and stress for many adolescents (Hertzog, Morgan, & Lena, 1997). Substantial research literature has emerged documenting the fact that the transition into high school is marked by increased disengagement and declining motivation, particularly for low-performing youth (National Research Council, 2004). Increased disengagement and declining motivation, in turn, predict subsequent school dropout. The national graduation rate is estimated by some to be 68 percent, with nearly one-third of all public high school students failing to graduate (Swanson, 2004). In the 35 largest central cities in the United States, between 40 and 50 percent of high schools graduate less than half of their ninth-grade class in four years (Balfanz & Legters, 2004).

Common features of American high schools increase the challenge of making a successful transition for many students. High schools are typically larger and more bureaucratic than elementary and middle schools, which lead to depersonalization and a lack of sense of community (Lee & Smith, 2001).

TAKE-AWAYS

so that Algebra I and Freshman English can be completed in the second semester.

 Gather statistics on the percentage of students completing and making progress in Algebra I and Freshman English by the end of ninth grade.

District Level

Comprehensive interventions designed to ease the transition to high school, whether developed by schools or external service providers, need formal endorsement and institutional support from districts in order to be optimally effective. Structural and curriculum reforms are accompanied by intense instructional focus that involves professional development goals best met with district support.

School Level

Implementing change can be demanding on schools, as it often requires adjustments in organization, new instructional approaches, and additional teacher support. School leadership that is able to embrace and lead positive change with both a sense of urgency and an awareness of the long-term commitment involved will significantly advance high school improvement.

When moving from middle grades to high school there is often a shift from focusing on teaching and nurturing the whole child to focusing—in a more limited way—on instructing students to learn the content of academic subjects. Both teachers and students report that the environment becomes more and more socially comparative and competitive in orientation as students move into high school (Roeser, Strobel, & Quihuis, 2002). Most large public high schools organize instruction around curricular tracks that sort students into different groups, which are often associated more with students' social class and ethnicity than with differences in talents and interests (Lee & Bryk, 1989). In addition, the transition may be more difficult for Latino students, especially if they are English language learners, and for students with disabilities (Askos & Galassi, 2004). Finally, these challenges are compounded by the fact that far too many of those entering the first year of high school are already testing below proficiency in math and reading.

THE CONTEXT

The No Child Left Behind (NCLB) Act of 2001 has placed a new focus on student achievement in high schools. Graduation rates and measures of student proficiency in reading and math are factored into state-defined standards for "adequate yearly progress," therefore, high schools are seeking ways to ready their students to show acceptable levels of learning by the time they are tested in the 10th grade.

Researchers at the Consortium on Chicago School Research have developed an "on-track" indicator that highlights the importance of the ninth grade: a student is on-track if he or she earns at least five full-year course credits and no more than one semester F in a core course in the first year of high school (Allensworth & Easton, 2005). On-track students are more than 3.5 times more likely to graduate from high school in four years than off-track students. This indicator is a more accurate predictor of graduation than students' middle school achievement test scores or their background characteristics (Allensworth & Easton, 2005).

KEY POLICIES AND INTERVENTIONS

This issue brief draws on key findings that show how transitions into high school can be eased when both structural supports and instructional/curricula reforms go hand-in-hand. By drawing on some of the most rigorous research evaluation available on ninth-grade practices and programs, the brief outlines the gains made when structural supports are successfully implemented for ninth graders and how those gains are strengthened when



STATE-LEVEL APPROACHES TO SUPPORTING TRANSITIONS TO HIGH SCHOOL

State Support for Smooth Transitions Into High School: A Checklist

This checklist is adapted from Middle Grades to High School: Mending a Weak Link, by Sondra Cooney and Gene Bottoms, Southern Regional Education Board (2002).

- Identify readiness indicators for high-school-level coursework
- Require districts and schools to report annually the percentage of students completing algebra and Freshman English by the end of freshman year
- Track whether schools are offering more rigorous courses to more ninth-grade students each year
- Communicate to families what ninth graders are expected to know and be able to do to succeed in high school
- Require one-on-one planning sessions for all students and their parents for the purpose of planning a rigorous high school program
- Require high schools to inform middle-grades feeder schools of the percentage of students who completed two years of college-prep English, math and science by the end of 10th grade
- Provide guidelines on how middle and high schools can work together to prepare students for high school
- Require and fund high schools to identify eighth graders who are not ready to take college-prep English and math in grade nine and provide a rich summer school experience
- Provide guidance on how to offer double-doses of catch-up courses—courses that are designed to help students meet
 the demands of more rigorous high school work, specifically algebra and English, when necessary—in the first semester of high school and enroll them in high school work by the second semester
- Require districts to report on the outcomes of their transition programs

instructional reforms are introduced as well. The studies reveal promising strategies that support not only ninth-grade students but also their long-term educational outcomes. The studies evaluated the Talent Development High School model in five high schools in Philadelphia and the model's predecessor, Project Transition, a research and demonstration program, in two high schools—one in Milwaukee, WI and the other in Kansas City, KS. The brief explains how school improvement programs can improve over time and highlights some of the ways even the strongest interventions need to be strengthened to meet the needs of more high school students.

WHEN STRUCTURAL SUPPORT AND CURRICULA REFORMS ARE PROVIDED TOGETHER

Talent Development's Ninth-Grade Success Academy

The Talent Development High School model is a comprehensive reform initiative designed to help transform the structure and curriculum of large high schools in urban districts, with the aim of improving students' levels of achievement and raising the expectations of teachers and students. The Talent Development High School model was initiated in 1994 through a partnership between the Center for Research on the Education of Students Placed At Risk (CRESPAR), based at The Johns Hopkins University, Patterson High School in Baltimore, MD, and Howard

University in Washington, DC. In 1998, CRESPAR, in collaboration with the Philadelphia Education Fund, began Talent Development's first and most ambitious scaling-up effort in Philadelphia.

MDRC evaluated the implementation of Talent Development in five large, nonselective, comprehensive high schools in Philadelphia where many students faced significant challenges, including poverty. The study followed ninth-grade students through up to five years of high school, ending in the 2003–2004 school year. The researchers examined the impact of Talent Development on attendance, course-taking and promotion outcomes. The ninth-grade students in the schools were predominantly African-American or Hispanic. Nearly half of the students were over age for grade, indicating that they had repeated a prior grade. Attendance rates averaged about 70 percent—in other words, students missed about six days of school each month. On average, they scored in the 20th percentile on nationally normed tests of reading and math in their eighth-grade year.

Early implementation in the five schools focused primarily on the Ninth Grade Success Academy, a small learning community for ninth-grade students and teachers. The Talent Development strategy for addressing ninth-grade issues has five main features: (1) a separate physical setting in which the needs of the incoming freshman class can be met in a distraction-free, concentrated way; (2) a team-teaching structure designed to divide the class into smaller, more intimate groups, identify specific students needing assistance, and provide that assistance effectively; (3) supports and incentives for students to attend school regularly and achieve academically; (4) a curricular regimen, built upon the extended block schedule, which was designed to help students overcome skill and knowledge deficiencies; (5) the Twilight Academy, a specialized program for ninth graders who failed, or experienced difficulty, in the normal school setting; and (6) ongoing coaching and professional development for teachers that is curriculum-specific and focuses on modeling lessons, strategies for learning, and classroom management. The implementation of these features in Philadelphia schools is described below.

• The separate setting of Ninth Grade Success Academies

A separate floor or wing of the school was marked with signs and banners as the Success Academy, with its own entrance wherever possible. (In traditional schools in the district, entering ninth graders would join the entire student body, and their courses might be held anywhere in the building.) The incoming ninth-grade class in Talent Development schools was divided into three or four separate groups, usually of 90 students each. An Academy Principal, with release time, directed the overall effort. The Talent Development implementation team (organizational facilitator and coaches, discussed further below) was usually located in the Success Academy floor or wing, helping to add to an environment that offered more personalized attention to the freshmen.

Small learning communities led by teams of teachers

Teaching these small groups of Talent Development ninth-grade students was the responsibility of teaching teams. Each team had a Team Leader who coordinated the team's work, handled discipline problems outside the scope of individual classrooms, and received a reduced teaching load. A team of teachers stayed with its student group throughout the academic year. In addition, class schedules were set to ensure that the teams would have common planning times in which they could meet to discuss student issues, resolve disciplinary problems (which might involve meeting with students and their parents), and address curricular or teaching matters. This system allows teachers in a team to share the same students. Whereas students in traditional high schools often feel little support from educational staff during their first year of high school (Seidman, Aber, Allen, & French, 1996), the creation of teacher–student clusters is aimed at enabling teacher teams to become acquainted with one group of students well, thus increasing students' sense of support. For students, teaming combined with shared scheduling aims to create small, stable groups of classmates that act as support networks.





• Student supports and incentives

The Success Academy also made use of incentives and recognition programs to encourage regular attendance at school. Award ceremonies were directed at students who achieved perfect (90 percent or higher) attendance during a given month, and also for students with high grades. Large attendance charts were posted throughout school hallways to reinforce the message that attending school was important; names of students with perfect attendance and outstanding grade performance were also displayed throughout the Academy space.

Another key component of the Success Academy was the regular use of "report card conferences." Small teams (sometimes supplemented by staff from CRESPAR or the local intermediary) would meet with each student when report cards were issued, review the student's grades, help the student assess progress toward promotion, and provide encouragement and support. This also became an opportunity for students to meet with individual teachers when they were experiencing problems with one of their courses.

• Specialized "catch-up" curriculum and extended block schedule

CRESPAR's curriculum was designed to provide students with additional assistance to meet the academic requirements of subjects—math and English, in particular—that they would be taking in high school.

The first semester of ninth grade was pivotal in the Success Academy. During the first semester, ninth-grade students took two preparatory "catch-up courses"—Transition to Advanced Mathematics and Strategic Reading—designed to enhance the skills of incoming freshmen and enable them to succeed in traditional ninth-grade algebra and English. To prepare students more broadly for the demands of high school, students also took a third Talent Development course, Freshman Seminar, which combines study skills, personal goal-setting, and social and group skills. This meant that ninth graders were routinely scheduled to take algebra in Talent Development schools, whereas in traditional schools, students with inadequate backgrounds might take a year of a lower-level course during ninth grade and then take algebra later. Taking algebra in the first year of high school rather than later is considered a strong predictor that a student is on track to graduate (Allensworth & Easton, 2005).

The success of this course arrangement in the Success Academy rested on extended block scheduling. Students were scheduled to take four courses per semester, each meeting for 90 minutes per day. Each one-semester course was worth a full credit toward graduation. With block scheduling, students could receive a double-dose of English and math in the ninth grade (the "catch-up" courses followed by traditional ninth-grade classes). This arrangement offered potential advantages to students in Talent Development schools: over a four-year period, they could potentially complete 32 credits, compared to 24 for students who attended schools with traditional rosters. Block scheduling also permitted some flexibility in rostering students who failed courses and needed to repeat them.

Coaching and professional development

Extended block scheduling, to work most effectively, requires teachers to divide 90-minute lessons into engaging and well-structured subunits and activities. Teachers received ongoing, curriculum-specific professional development, focusing on modeling upcoming lessons, improving content knowledge, learning instructional strategies, and trying classroom management. For each course, there were two to three days of training in the summer and one two- to three-hour training session each month during the school year. In addition, coaches specializing in math and reading were available to work with teachers on a weekly basis. Ongoing technical assistance was also provided by CRESPAR-affiliated organizational facilitators, who coordinated components of Talent Development at the sites, including teacher coaching, curriculum materials and other resources, workshops, and student–teacher meetings.

• The Twilight Academy

The Twilight Academy was designed as a special program for current and "repeater" ninth graders who either needed special academic support or needed to be placed outside the normal school environment (for disciplinary or other reasons). This program usually operated in a separate section of the school and outside normal school hours—often later in the day so that some students could work or attend to family matters. The Twilight Academy was an important complement to the Success Academy. It provided flexible and tailored help to academically struggling students. They could, after they had completed missed work or failed courses, rejoin the main school. Just as important, though, was its value in providing a setting where potentially disruptive students could be placed, in lieu of potentially suspending/expelling them or transferring them to one of the district's disciplinary schools.

KEY FINDINGS FOR TALENT DEVELOPMENT¹

- Talent Development produced substantial gains in attendance, academic course credits earned, and promotion rates during students' first year of high school. For a typical entering ninth-grade class of 500 students, Talent Development added about nine days of school attendance for each student, helped an extra 125 students pass algebra, and helped an extra 40 students get promoted to the 10th grade on time.
- The substantial improvements in credits earned and promotion rates were sustained as first-time ninth graders moved through high school.
- Talent Development produced marginal improvements in student performance on the eleventh-grade standardized state test in math but produced no systematic change in reading scores for the first cohort of students to experience the model.
- The likelihood of repeating the ninth grade declined in Talent Development high schools (due to the model's impact on promotion rates). Those students who needed to repeat the ninth grade registered improved attendance but were still more likely to leave school.
- Based on evidence from only the first two schools to implement the model, Talent Development appears to have produced positive impacts on high school graduation rates and on the standardized state test for later cohorts of students. In the first two high schools to implement Talent Development, the model increased the likelihood that first-time ninth graders would graduate on time by about 8 percentage points. In other words, for a typical class of 500 students entering ninth grade, Talent Development was able to produce an average of about 40 new graduates per year. Please see CRESPAR's Web site (http://www.csos.jhu.edu/crespar/) for further information.

WHEN PRIMARILY STRUCTURAL SUPPORTS ARE OFFERED

Project Transition could be considered a forerunner to Talent Development's Ninth Grade Success Academy as a research and demonstration project that represented an early attempt to intervene in the ninth grade. It focused primarily on structural reforms, and its structural components resembled those of Talent Development: small learning communities, student–teacher teams, and common planning time for teachers. Project Transition also included coaching around instruction, but it did not include the specialized curricula, prescribed instructional methods, and after-hours academy that were intrinsic parts of the Talent Development model. Rather, Project Transition teachers, with input from the coach, identified and pursued instructional practices of their own choosing. However, it can be instructive to review the ways in which structural reforms can create the necessary conditions for improvement and to review how interventions can become stronger over time.



Project Transition

The Project Transition program developed and evaluated by MDRC was designed to test the effectiveness of a set of reforms intended to improve students' attendance and performance in the first year of high school. Project Transition was implemented and evaluated in Pulaski High School in Milwaukee, during the 1995–96 and 1996–97 school years, and in Schlagle High School in Kansas City, KS, during the 1996–97 school year. Both Pulaski and Schlagle were large comprehensive high schools in urban school districts. The schools served high percentages of students of color and of students receiving free or subsidized lunch. Both sites had high percentages of students with low grade point averages (GPAs), high rates of students dropping out, and declining rates of student attendance and GPAs from eighth to ninth grade.

Project Transition implemented three main strategies to change the environment for ninth-grade students and teachers:

- Student-teacher teams of four core subject teachers and a group of students who shared many of the same core classes
- Daily teacher team meetings for collaboration on professional development and on solutions to student problems
- Coach position and other supports to aid teachers' professional development and efforts to improve instructional practice

Program developers expected these strategies to alter students' and teachers' attitudes and behavior in ways that would help students make a successful transition from middle school to high school and ultimately improve their attendance and performance.

In addition, each Project Transition high school had a learning resource partner, a local institution or agency that would support the Project Transition coach and provide ongoing technical assistance and professional development for the teachers. Other supports included mandatory summer institutes, consisting of several days of professional development and planning, and supplementary funds for use by the teacher teams for professional development.

KEY FINDINGS FOR PROJECT TRANSITION²

- Project Transition created a more supportive environment at both Pulaski and Schlagle for students and teachers alike.
 At Pulaski, students reported feeling supported and respected by classmates. At Schlagle, more Project Transition students than their pre-Project Transition counterparts reported feeling cared for by teachers who held high expectations of them.
- Project Transition achieved positive effects on selected student academic outcomes at Schlagle, where it was more fully implemented. At Schlagle, more students passed their courses—and thus increased their average number of credits earned—than did their pre-Project Transition counterparts.
- At Schlagle, Project Transition students also reported being more engaged and experiencing a greater sense of autonomy relative to earlier cohorts of ninth graders. Project Transition did not have notable impacts on attendance or GPAs at either school.³

THE BOTTOM LINE

When high schools successfully implement structural reforms to support incoming freshman, they provide some of the necessary conditions for success in the ninth grade; when they couple these reforms with specific instructional

and curricular reforms, students can only strengthen their academic achievement and long-term success in high school. Project Transition's structural interventions by themselves had only modest effects on student outcomes, but the model's core elements may serve as a foundation for other interventions. Large urban schools can be impersonal environments, so it is notable that Project Transition reduced the sense of isolation among both students and teachers in the two schools studied. The elements of Project Transition may serve as an important complement to other interventions that focus more on instruction.

A key lesson learned from these studies is that structural changes intended to increase personalization and strategies to improve and better tailor curriculum and instruction work together to improve student outcomes. Both interventions used structural changes to create more personalized learning environments and to increase student engagement. Both created small learning communities for ninth graders, teamed students and teachers, and built in time for teachers to work together. Both also provided ongoing coaching for teachers. Coupled with these structural changes, Talent Development's Success Academy additionally provided a more intense instructional focus built around its specialized curriculum and extended block schedule. The content of its "catch-up" courses was designed to help students meet the demands of more rigorous high school work, specifically algebra and English. The curriculum also focused professional development on improving daily instruction in concrete and specific terms. The block schedule facilitated scheduling double-doses of math and English, helping students who entered high school behind or who failed in the first semester get back on track for graduation. And, in combining both structural and instructional changes, Talent Development had stronger effects.

The schools in these studies still have a long way to go to reach the goal of preparing all students for graduation, postsecondary education, and employment. For example, even in the most successful Talent Development schools, a typical ninth grader will still miss about 40 days of school, nearly one-third will not be promoted to the 10th grade, and more than half will not be ready to graduate within four years. Thus, even relatively successful interventions such as Talent Development need much more power.

Also, these initial positive results required significant funding, as well as very demanding changes to school organization, instruction, and teacher support. Both interventions included an intensive one-year planning period. Early buy-in from school leaders and teachers was a key element of both programs. Project Transition also had the support of the schools districts that helped to plan the intervention. Although the district lent financial support for Talent Development, the intervention did not receive formal endorsement and deeper institutional support. The effectiveness of Talent Development and other comprehensive school reforms is likely to be enhanced and more readily sustained with official recognition and institutional support from school districts—providing greater authority to institute changes in the schools, to focus staffing and leadership decisions on specific school improvement strategies, and to marshal funding and resources.

END NOTES

The study focused on estimating the impact of Talent Development for three cohorts of first-time ninth graders from each of the five Talent Development high schools, following these students for up to four years of high school. Impacts were estimated using a comparative interrupted time series design, which compared changes in student performance in Talent Development schools before and after implementation to changes in student performance during the same time period in a set of matched comparison schools. MDRC was able to obtain data on consistently measured student outcomes for three pre-intervention baseline years and up to five post-intervention follow-up years for five Talent Development schools and six comparison schools within the same school district.





The research design, through the use of individual student data, was able to statistically adjust impact estimates for changes in student cohorts' background characteristics over time. In addition, the comparative interrupted time series design used in the Talent Development evaluation uses comparison schools to capture districtwide events or programs that may affect student outcomes. Although no quasi-experimental methodology irrefutably establishes causality, the Talent Development study is particularly rigorous and provides a strong basis on which to attribute changes in student performance to Talent Development.

- In order to estimate Project Transition's effects on students, data were obtained from two sources. First, a survey was administered to each group of students during the spring semester of their ninth-grade year. Second, school records data were provided by the school districts involved. Project Transition's effects on students were estimated using a cohort comparison design, in which each year's entering ninth-grade class is referred to as a cohort. The differences in student experiences and performance between the pre-Project Transition and Project Transition cohorts represent the impacts, or effects, of Project Transition.
- The cohort comparison design used in the Project Transition evaluation, lacking comparison schools and multiple pre-implementation cohorts for comparison, did not establish as strong a counterfactual as in the Talent Development evaluation. Therefore, the Project Transition findings should be interpreted with greater caution.

ADDITIONAL RESOURCES

DETERMINING A SCHOOLS' PROMOTING POWER STARTS WITH INFORMATION ABOUT NINTH GRADE

The researchers Robert Balfanz and Nettie Legters found that low graduation rates are driven by students who enter high school poorly prepared for success and who have trouble transitioning from ninth grade.

Such students disengage from school, attend infrequently, fail too many courses to be promoted to the 10th grade, and ultimately drop out of school. Balfanz and Legters found that up to 40 percent of ninth-grade students in cities with the highest dropout rates repeat the ninth grade but that only 10 percent to 15 percent of those repeaters go on to graduate.

For states and districts seeking to identify those schools with the weakest or strongest promotion power, the following formula can be applied:

Using data compiled by the National Center for Education Statistics (NCES, Web site: http://nces.ed.gov/), Balfanz and Legters of the Center for Social Organization of Schools at Johns Hopkins University measured the "promoting power" of high schools with enrollments of more than 300 by comparing the number of freshmen with the number of 12th graders four years later.

A school has "weak promoting power" if the freshman class shrinks by 40 percent or more by the time students reach their senior year. These schools are overwhelmingly attended by minority students.

The Promoting Power Index uses the following formula: The number of students in 12th grade compared to the number of students enrolling in ninth grade for the first time. For example:

AN ASSESSMENT TOOL FOR SCHOOLS AND NINTH-GRADE STUDENTS: DETERMINING EARLY WHICH STUDENTS NEED THE MOST SUPPORT

The following student assessment instrument is used to help identify the students most at risk of dropping out in order to assist personnel in leveraging resources for maximum benefit. The tool, developed by researchers Raymond Morley and James Veale and used by New Hampshire's Achievement in Dropout Prevention and Excellence (APEX II) program in partnership with the University of New Hampshire's Institute on Disability, helps match appropriate supports with individual student needs, particularly those students most at risk, in order to help ensure a smooth transition into and through the gatekeeper year of ninth grade and beyond.

After signing confidentiality agreements, transition teams participating in New Hampshire's APEX II program work with middle schools to gather relevant information. The transition teams include individual guidance counselors and, in some cases, special education teachers who complete the information process with input from student files. If the middle-grades school uses additional methods for tracking academic and behavioral problems, those sources are reviewed as well.

APEX II

STUDENT RISK ASSESSMENT INSTRUMENT

Student ID:		Date:	
-------------	--	-------	--

Characterization:

- Low risk if no factors are present
- Medium risk if one to three noncritical factors are present
- High risk if (a) one or more of the critical factors are indicated or (b) four or more of the noncritical factors are indicated.*

Critical Factors	Check (√) if present
Dropout or expelled	
2. Victim of physical, psychological, sexual abuse, rape or other violent crime; student has experienced trauma	
3. Pregnancy/teen parent	
4. Homeless (on the street, shelter, transitional housing, living with friends or other temporary arrangements)	
5. Language/cultural barriers. Recent immigrant	
6. Poor attendance, repeated suspensions, repeated tardiness (more than three unexcused absences in past four months, late to school more than three times)	
7. Repeated behavioral infractions (sent to office more than three times per month)	
8. Out-of-home placement (foster care, detention, independent living, residential treatment, etc.)	
9. Committed criminal acts	
10. Engages in self-injurious behavior (cutting, taking part in very dangerous or risky behavior)	
11. Gang membership	

SSUE BREET





An Assessment Tool for Schools and Ninth Grade Students: Determining Early Which Students Need the Most Support (continued)

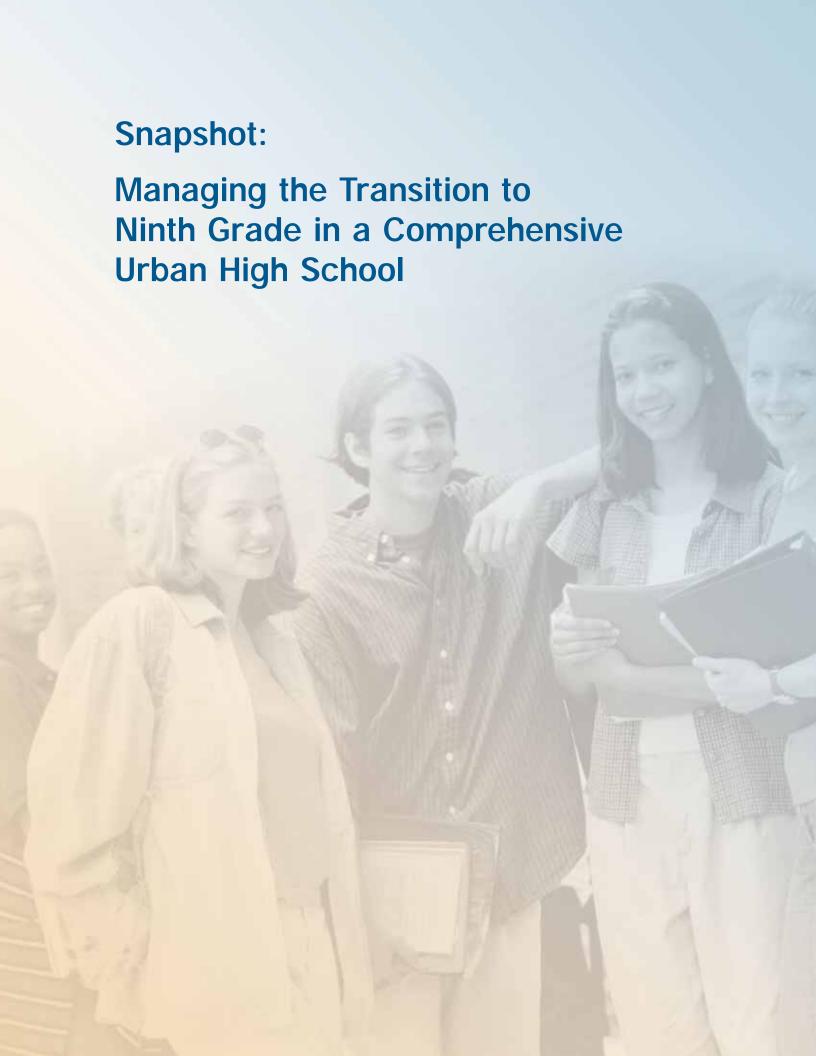
Other Factors	Check (✓) if present
1. Has/is experiencing repeated school failure (low achievement, low grades)	
2. Special education student or student with mental, learning, emotional or physical disabilities whose needs are not met through SPED services	
Mental health challenges (including depression, violent behavior, suicidal ideation, sudden mood or personality changes)	
4. No extracurricular school activities	
5. Recent crisis (death, divorce, illness) or life transition	
6. Social isolation/relationship problems/negative peer influence	
7. Eating disorders	
8. Chronic health condition	
9. Substance abuse by self or family member	
10. Economically disadvantaged	
11. Committed delinquent acts	
12. Lack of motivation to improve	
13. Family dysfunction/youth's needs are not being met by the family	
14. Lack of interests	
15. Lack of work ethic	
16. Extreme mobility (moving two or more times in one year)	
17. Teacher/staff referral (reason)	

^{*} Adapted from Morley, R. E., & Veale, J. R. (2002). Student risk assessment for identifying needs and evaluating impacts. *Monograph.* Retrieved November 2005.

REFERENCES

- Allensworth, E., & Easton, J. (2005). *The on-track indicator as a predictor of high school graduation.* Chicago: Consortium of Chicago School Research.
- Akos, P., & Galassi, J. P. (2004). Gender and race as variables in psychosocial adjustment to middle and high school. *The Journal of Educational Research, 98*(2), 102–108.
- Alspaugh, J. W. (1998). Achievement loss associated with the transition to middle school and high school. *The Journal of Educational Research.* 92(1), 20–25.

- Balfanz, R., & Legters, N. (2004). *Locating the dropout crisis: Which high schools produce the nation's dropouts? Where are they located? Who attends them?* Baltimore: Johns Hopkins University.
- Cooney, S., & Bottoms, G. (n.d.). *Middle Grades to high school: Mending a weak link.* Atlanta: Southern Regional Education Board. Retrieved March 20, 2007, from http://www.sreb.org/programs/hstw/publications/briefs/02V08_Middle_Grades_To_HS.pdf
- Fine, M. (1991). Framing dropouts: Notes on the politics of an urban public high school. Albany: State University of New York Press.
- Hertzog, C. J., & P.L. Morgan, P. L., (1997). From middle to high school: ease the transition. *Education Digest*, *62*(7), 29–31.
- Kemple, J. J., Herlihy, C. M., & Smith, T. J. (2005). *Making progress toward graduation: Evidence from the talent development high school model.* New York: MDRC.
- Lee, V. E., & Bryk, A.S. (1989). A multilevel model of the social distribution of high school achievement. *Sociology of Education*, *62*, 172–192.
- Lee, V. E., & Smith, J. (2001). *Restructuring high schools for equity and excellence: What works.* New York: Teachers College Press.
- MacIver, D. J., Reuman, D. A., & Main, S. R. (1995). Social structuring of school: Studying what is, illuminating what could be. *Annual Review of Psychology, 46,* 375–400.
- Morley, R. E., & Veale, J. R. (n.d.). *Student risk assessment for evaluating needs and evaluating impacts.* (Available from Dr. Raymond Morley, Iowa Department of Education, Grimes State Office Building, Des Moines, IA, 50319)
- National Research Council. (2004). *Engaging schools: Fostering high school students' motivation to learn.* Washington, DC: National Academies Press.
- Quint, J. (2006, May). *Meeting five critical challenges of high school reform: Lessons from research on three reform models.* New York, NY: MDRC. Retrieved March 15, 2007, from http://www.mdrc.org/publications/428/full.pdf
- Quint, J. C., Miller, C., Pastor, J. J., & Cytron, R. E. (1999). *Project transition: Testing an intervention to help high school freshmen succeed.* New York: MDRC.
- Roderick, M., & Cameron, E. (1999). Risk and recovery from course failure in the early years of high school. *American Educational Research Journal*, *36*, 303–344.
- Roeser, R. W., Strobel, K. R., & Quihuis, G. (2002). Studying early academic motivation, social-emotional functioning, and engagement in learning: Variable- and person-centered approaches. *Anxiety, Stress, and Coping,* 1–24.
- Seidman, E., Aber, J. L., Allen, E. L., & French, S. E. (1996). The impact of the transition to high school on the self-system and perceived social context of poor urban youth. *American Journal of Community Psychology.* 24(4), 489–515.
- Swanson, C. (2004). *Who graduates? Who doesn't? A statistical portrait of public high school graduation, class of 2001.* Washington, DC: The Urban Institute.



Managing the Transition to Ninth Grade in a Comprehensive Urban High School

by Thomas J. Smith, MDRC

The transition into ninth grade is a critical phase in students' lives and academic careers. The move to a larger environment, the reduction in personal support, and the greater academic challenge posed by high school courses is too often problematic for rising ninth-grade students.

THE SCHOOL DISTRICT OF PHILADELPHIA

- 210.000 students
- More than 80 percent students of color
- 47,000 high school students
- 45 regular high schools
- 16 charter high schools

Difficult ninth-grade transitions can result in flagging academic performance, increased dropout rates, and reduced on-time graduation. In urban school districts—and particularly in the large, comprehensive high schools found there—these problems are particularly commonplace.

In Philadelphia, the nation's eighth-largest school district, high school reform has emerged as an urgent and visible priority. Uneven performances on statewide tests and recent public concern over school dropouts have added to the school district's desire to strengthen the performance of students throughout high school.

Some ninth-grade transition initiatives are being tried in the city's

high schools. One high school in particular has, for the past seven years, been following a model program addressing many of the transition issues identified in the research.

THE NINTH GRADE SUCCESS ACADEMY

Thomas Edison High School, a comprehensive high school serving a low-income, largely Hispanic population, uses the Ninth Grade Success Academy, a component of the Talent Development High School program, a reform strategy developed by the Center for Research on the Education of Students Placed at Risk (CRESPAR) at Johns Hopkins University. The full Talent Development model is currently being replicated in a number of cities nationwide.

The Success Academy, perhaps the most critical element of the Talent Development program, reflects a number of assumptions about how to make the ninth-grade transition successful:

- Many entering students have deficient basic skills, particularly in English and mathematics, which must be addressed using well-designed curricula and high-quality instruction.
- Students need added structure and extra personal support and attention as they make their way through ninth grade.
- Ninth-grade teaching staff need opportunities to collaborate, both on their teaching and their support for students.



The Success Academy is a school-within-a-school with a number of features specifically designed to help ninth-graders make a successful transition, and is described below.

PERSONALIZED LEARNING COMMUNITY

The Academy is physically separate from the rest of the school, in its own wing of its own floor. It has its own entrance and ninth-graders have few opportunities to interact with upper-class students. Teachers and staff greet students at the front door in the morning as they arrive. The aim is to make personal connections with the students, minimize distractions, promote a small but structured community environment, and enhance opportunities for students and teachers to interact. The students "know the rules will be enforced," explained the Success Academy principal (actually one of Edison's three assistant principals, whose sole responsibility is managing the Academy).

TEACHER TEAMS AND TEAM LEADERS

The ninth-grade faculty is organized into four teams, each responsible for teaching and interacting with its own group of students throughout the school year. Each has a team leader (with a reduced teaching load) who handles team logistics, arranges meetings and parent conferences, and handles discipline problems. Special education students are grouped in one of the four teams, and that teaching team is supplemented with a special education teacher, who works across classes. Each team's schedule is arranged so that teachers have common planning times.

Teachers report that the team approach works and that, as one teacher put it, "the support is key. If you're having a problem, your team members can help. If a student is having a problem, all the team members know about it and can support one another and the student." Common planning time gives teachers the chance to compare notes, trade ideas, discuss student issues, meet as a group with parents when problems arise, and create projects or activities that span individual subjects.

BLOCK SCHEDULING AND DOUBLE-DOSING

Block scheduling and "double-dosing" intensify the learning experience. Ninth-graders take just four subjects per semester (each equivalent to a yearlong subject in traditional schedules), and their class periods are divided into 90-minute blocks. The extended classes are designed to permit teachers more opportunities to reinforce learning and explore topics in depth.

Fewer class changes also minimize hall time and cutting. "It's orderly ... and that helps us maintain a learning environment," noted a ninth-grade teacher. All students at Edison are required to wear uniforms, and "the students know we'll enforce it very strictly," the Academy principal said.

Besides the block scheduling, English and math are "double-dosed," with students taking them for a full year, and receiving double credits for their work. Together, these innovations reinforce and build critical basic skills that incoming ninth-graders often lack upon arrival.

Specialized curricula created by Talent Development are one key to successful double-dosing. *Strategic Reading and Transition to Advanced Math* are offered in the fall semester as a bridge to prepare students for the school district's own standardized courses, English I and Algebra I.

FRESHMAN SEMINAR TEACHES STUDY SKILLS

By having an intensive, preparatory first semester, students can make up ground and strengthen academic skills, so more of them succeed in the District's own curriculum. In addition, all ninth-graders take a freshman seminar, a Talent Development course that helps students learn study skills, time management, note-taking and how to handle the challenges of dealing with other students in a high school environment.

A CLEAR FOCUS ON STUDENT SUCCESS

Other program features include: (a) report card conferences in which each student, his or her parents or guardians, and teachers meet; (b) a continuous and visible focus on attendance and grades (class attendance is posted in hall-ways, and regular ceremonies and prizes for perfect attendance and making honors); (c) a summer orientation for incoming freshmen to familiarize them with the school; and (d) a "Twilight Academy," where struggling students can work for missed or additional credit in an alternative setting.

Students respect the structured and personalized setting. "My teachers really try to help me understand" the coursework, one said, adding that "teachers in other schools wouldn't take the time."

"They're strict, and they know from one another if you've been working," a second student noted. "You really have the chance to learn, if you want to, and I want to."

Students who were interviewed recognized the benefits of the Academy setting, even if they chafed a bit at uniforms and the limited opportunities to interact with older students in the school. "We're in this separate place, but we can learn here and the teachers care about us," a student said. "I can live with that."

LEADERSHIP SUPPORT

Though the Success Academy is, in one sense, autonomous, it very much depends on support from the school's leadership. Edison's principal has been an emphatic supporter of the Academy idea since he first learned of it seven years ago. "I knew it was right for this school, and I did everything I could to bring it here." The principal has maintained his enthusiasm, even in the face of diminishing outside resources to support the Academy, the team structure and other components of which are an added expense in the budget. "I've had to find resources within my existing budget, but I do because this is important," he said.

CONTINUING CHALLENGES AT EDISON

The Success Academy's present and future at Edison are far from trouble-free. The School District of Philadelphia's move to a standardized curriculum, with citywide pacing requirements and periodic benchmark tests, has forced instructional compromises in the Academy's "double-dosing" approach, with uncertain results. And funding and age restrictions have all but eliminated the Twilight Academy element of the Success Academy.

Overall academic progress has been modest. Although Edison met 18 of 25 state academic targets, it did not achieve Adequate Yearly Progress, as required by No Child Left Behind. But there are some promising signs: Edison reached its targets for reading proficiency for all students and for key subgroups—economically disadvantaged students, students with disabilities, Hispanic students, and students with limited English proficiency (LEP). Graduation rates have risen in four of the past five years. The most consistent challenge has been in math, for which test scores for most subgroups have remained disappointingly low. And, overall, significant numbers of students fall below basic in both math and reading.



These results underscore the difficult challenge of serving a markedly low income student population, with large numbers of minority, special education and LEP students. Despite the promise of programs like the Success Academy, widespread improvement in academic performance is difficult to achieve.

CONCLUSION

The Success Academy stands as a thoughtfully designed strategy for increasing successful ninth-grade transitions. At Edison, it gets high grades from teachers and students, who believe its supportive structure measurably enhances the learning environment and eases the move into high school. Edison's administration has demonstrated its commitment in a special way: three years ago it created a Tenth Grade Academy, modeled on the Success Academy, to extend and reinforce the benefits and momentum of the ninth-grade model.

RESOURCES

Thomas A. Edison High School, Philadelphia, PA:

http://www.phila.k12.pa.us/schools/edison/index.html

School District of Philadelphia:

http://www.phila.k12.pa.us/

A policy brief authored by Corinne Herlihy of MDRC and the National High School Center: State and District Level Support for Successful Transitions into High School [http://www.betterhighschools.org/docs/NHSC_PolicyBrief_TransitionsIntoHighSchool.pdf]

An issue brief authored by Corinne Herlihy of MDRC and the National High School Center: *Toward Ensuring a Smooth Transition Into High School* [http://www.betterhighschools.org/docs/NHSC_TowardEnsuring_051607.pdf]

A fact sheet authored by the National High School Center: *The First Year of High School: A Quick Stats Fact Sheet* [http://www.betterhighschools.org/docs/NHSC_FirstYearofHighSchool_032807.pdf]