

Leading Change in High Schools



**International Center
for Leadership in Education**

Acknowledgment

The author, Richard D. Jones, sends a sincere thank you to the educators who contributed to Chapter 4 of this kit.



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Throughout our country's history, the purposes of education have been expanded in response to societal needs.

Overview

Improving high schools has become one of the most significant challenges in education. In many districts, schools are not designed to deal with today's technology, the global and media-driven world we live in, or the equity issues that educators must face every day. Yet, society demands no less. Throughout our country's history, the purposes of education have been expanded in response to societal needs. Today, there is a general consensus that education plays four basic roles.

1. Foster intellectual development.
2. Prepare students to be informed, caring, and productive citizens.
3. Prepare students for higher education.
4. Prepare students for the world of work.

Preparing students for work has gained importance because the academic skills used in the workplace often are at a higher level than and different from those needed for college. Moreover, careers are a common denominator for all students.

Because of the inability of schools to change as quickly as business leaders, universities, parents, and other community members deem necessary, there is a continuing erosion in support for public education from these key stakeholder groups. The biggest fear educators may need to confront is that if they do not make some substantive changes, they will lose the best of what they now have and miss the chance to address the areas that need improvement. Therefore, we must have leaders who cannot be seduced into ignoring what we should do. We have made progress, but not fast enough or extensive enough for what our children deserve. So, how can we preserve the best traditions of high school and still do a better job of preparing today's youth for a challenging future? Successful change is the answer.

Leading Change in High Schools

Leading Change in High Schools offers inspiration, insight, models, practical advice, and effective frameworks and other tools to improve high schools through sustainable change. It is not about simply adopting best practices, but rather about creating a culture that recognizes strengths and weaknesses, encourages innovation and initiative, and adapts best practices and ideas from others. The goal is not to make every school the same, but to enable each one to construct its own solutions.

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The resource kit examines three major change activators that uniquely define the International Center's model of change.

1. Aspire to rigor, relevance, and relationships.
2. Begin with the end in mind.
3. Consider schools as a "living system."

The kit also describes a series of change principles that provides greater detail to the practices that schools can use to implement desired changes. These practices have come from the nation's most successful and most rapidly improving schools. Not all schools are failing. We have found successful, innovative schools in many different communities. Many schools do well even when confronted with the challenges of poverty and mobility. We have learned a tremendous amount from them. These model high schools have demonstrated the importance of building a culture of high academic expectations for all students, a tradition of continuous improvement, powerful structures of teaching and learning, collaborative leadership, and student support.

Chapter 1: The High Schools We Need defines the issues around the need for high school change. While it is true that high schools have prepared many students for postsecondary success and further vocational study, there are still many students who either

drop out of high school or drift along ill-prepared for their future. All of our children deserve a high school education that prepares them for college, the workforce, and life. Ultimately, successful schools focus on the future. The goal is to help students think on their own to respond to unpredictable situations and learn to be responsible citizens in a fast-paced society in which there are many unknowns.

Chapter 2: Understanding the Dynamics of Change reviews literature and research from business and education leaders on the subject of change. The chapter explains why change fails and the mechanisms that can be put in place to sustain change. It also details the process of change. There are four themes that emerge from the most credible and up-to-date research and expertise on change: change initiators, change process, change principles, and change strategies.

Chapter 3: Why Change and How to Do It lays out in much more detail the reasons that secondary education must change in this country. The chapter also outlines the key facets of the principles of change and strategies that form a unique model of school change. The International Center's work in creating this model revealed that schools usually need to address four interconnected questions in order to achieve high academic standards for all students — *why*, *what*, *where*, and *how*. Several frameworks, developed by the International Center, also are integrated into the chapter. These education resources for both administrators and teachers are the Rigor/Relevance Framework, the Learning Criteria to Support 21st Century Learners, and the Relationship Framework. In addition, the chapter introduces the concept of schools as “living systems” that must adapt to their ever-changing environments. Each school is different, with its own set of DNA, and there is no one plan that can be incorporated to change all schools. However, there are lessons

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that can be learned from other schools. The model of change described in this chapter is the result of analyzing the best practices from the most rapidly improving schools across the country.

Chapter 4: Principles of Change — Practitioner Perspectives

shifts from theories of change to the practice of change. Successful high school leaders share their perspectives in insightful essays, each related to one of 13 principles of change. These articles offer inspiration and spell out some practical advice, as well as provide a way to stimulate conversation among school leadership teams.

Chapter 5: Components of School Excellence describes in detail the International Center's latest education tool to help teachers and administrators organize and analyze improvement efforts, as well as to make sense of the complex array of change initiatives. This framework is called the Components of School Excellence. There are eight of these components, derived from the International Center's work with the most rapidly improving schools. The components are described in a logical order, but should not be considered a rigid sequence to follow.

Chapter 6: Tools and Techniques for Professional Development

is a collection of activities and checklists to equip administrators and teachers with the tools needed for success. Electronic versions of these and other activities and checklists are included on the accompanying CD.

CD and DVD: Two resource disks are included with the resource kit. The CD includes electronic copies of the activities and checklists from Chapter 6, which can be printed and adapted for use. The DVD includes five video presentations related to the International Center's model of change. Bill Daggett, President of the International Center, describes the *why* of change and *what* to change. He focuses on the Rigor/Relevance Framework as a driving vision. In a separate

presentation, Dr. Daggett describes the process of change using the Components of School Excellence. Ray McNulty, Senior Vice President of the International Center, describes the *where* of change and incorporates the Learning Criteria to Support 21st Century Learners to set goals and measure progress. Dick Jones, International Center Senior Consultant and author of this resource kit, outlines the *how* of change. In his presentation, Dr. Jones likens our schools to “living systems” that must be continuously open to change in order to move forward. In another presentation, Dr. Jones describes 13 change principles for success.



Chapter 1



The High Schools We Need

A Lasting Impression

High school is a major life experience that creates lasting memories and often defines the future direction of our lives. Unfortunately, for many people high school is a memory they would rather forget.

High school is a major life experience that creates lasting memories and often defines the future direction of our lives. Many of us can look back and fondly remember that dynamic teacher who, for some reason, took a special interest in us and inspired us to make more of our lives than we thought possible. In high school, we often discover special talents or interests, whether that be in music, drama, debate, athletics, scientific inquiry, or a technical skill. High school provides expanding opportunities at a time when adolescents are discovering who they are as individuals and willing to take risks to try new things in the process of becoming mature adults.

Unfortunately, for many people high school is a memory they would rather forget. This was illustrated at one conference in which 20 national educators came together to work on high school curriculum improvement. To start the conversation, the facilitator asked each educator to share a memorable high school experience. As expected, the majority of the group told compelling or humorous stories of the teacher who had changed their life, the time they got caught kissing a boyfriend under the stairs, or the outstanding student award or dramatic sports championship they received.

However, when the conversation moved to one educator, a leading researcher on high school improvement, she did not offer a heartwarming story. Instead, she offered this: "High school was the worst time my life. That is why I work so hard now to improve high schools — so, other young people don't have the same experience I had."

Perhaps such admissions from adults are not heard often, but the reality is that high school is not a universally positive experience. In fact, it is a negative experience for many students who want to leave as soon as possible, even if it means not graduating.

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How is it that high school can be a powerful positive experience for some students and a negative experience for others? The answer can be explored in some basic characteristics in the way high schools are organized: a compartmentalized curriculum, lack of focus on student learning, and labeling and leveling. These characteristics tend to lead to depersonalization and disconnection from life outside the classroom.

Compartmentalized Curriculum

In the U.S. education system, the most effective learning occurs in the elementary grades. Teachers are not hindered by subject boundaries as much as in later grades, so interdisciplinary instruction occurs more naturally. Elementary schools are designed to have a uniform curriculum from grade level to grade level so that students take the same subjects in the same allotted time frame. On the other hand, the traditional high school has a much more specialized curriculum. Not every student takes the same courses or has the same class experience. By the time students reach high school, their learning needs are more diverse and therefore the need for more options. Some students still struggle with basic reading and math, while other students can handle advanced-level work.

To some degree, high schools are designed more around a college model with teachers narrowly focused on one discipline. The rationale for this structure is that it is possible to have more highly qualified teachers with a greater depth of knowledge in a discipline. Teachers are better able to impart knowledge to students when they have deep knowledge of a subject. The result of such a rigid focus is that, as students move from class to class and progress to the next grade, they are exposed to isolated bits of content-specific knowledge, but they are not taught how what they learn in one class relates to another or its application in the world outside

Barriers to Academic Excellence

A compartmentalized curriculum, lack of focus on student learning, and labeling and leveling are characteristics that tend to lead to depersonalization and disconnection from life outside the classroom.

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of school. Globalization and rapid technological advancements are having dramatic effects on the ways we communicate and conduct business, as well as in our personal lives. Education should increase students' understanding of the world around them. Unfortunately, there is little or no connectivity or integration between subjects, the learning process, or the real world.

The tradeoff for students having to learn in large education environments, is alienation, lack of identity, and becoming less engaged in the learning process.

Moreover, curriculum specialization has driven high schools over time to become larger and, therefore, there tends to be a less personalized approach. Larger schools can offer more specialized courses in foreign language, career and technical education, and multiple levels of English literature, and advanced science. The trade-off for students having to learn in such large education environments, however, is alienation, lack of identity, and becoming less engaged in the learning process.

Lack of Focus on Student Learning

In elementary school, teachers spend more time throughout the day with their students and that interaction allows for easier and more plentiful teaching opportunities. Elementary students are uninhibited in their enthusiasm to learn and are not afraid to ask questions.

By the time students get to high school, instruction becomes segmented and many students become less engaged in the learning process. Their ability to investigate interconnections between what they learn is stifled because the teacher has too much material to cover and not enough time. In addition, most teachers migrate to high school teaching because of their love of their specialized subject matter. That makes them passionate about their work, but often less concerned about the needs of students.

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Labeling and Leveling

Labeling takes many forms in high schools. Competition is introduced in academics, athletics, and social activities. Many educators support the position that teaching high school means responding to the challenge of competition. The argument that there are winners and losers in life only goes so far in supporting the unending labeling of students in school.

For what purpose do schools rank students, for instance? The strongest argument seems to be that colleges want this information to make it easier to select students. Others argue that having a competitive ranking encourages students to work harder. This latter argument may hold some water for a student trying to raise a ranking from 6th to 1st place or trying to cross into the top 10%. But whether a student is ranked 153rd or 235th is meaningless. Moreover, it is ironic that educators rail against state ranking systems of schools because the measures of state tests are too narrow and yet they perpetuate the same traditions in ranking students on narrow measures of learning.

It is ironic that educators rail against state ranking systems of schools because the measures of state tests are too narrow and yet they perpetuate the same traditions in ranking students on narrow measures of learning.

Another aspect of labeling is the leveling of courses. There are Honors, High Honors, Advanced Placement, etc., not to mention general and basic classes. Students soon learn there is social status tied to the leveling of their courses and whatever is perceived as the lowest level seems to result in students falling into a chasm of low expectations. In some large high schools, the leveling system has evolved into six different levels of courses. The reasoning behind such a system is that a more homogenous grouping of students makes it easier for teachers to provide group instruction that is paced properly with the entire class. This may be the stated purpose, but anyone who has worked to increase the level of engagement, low-level classes are the most mind-numbing experiences.

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Educators need to ask: Should schools continue to sort and label “winners” and “losers” as part its overall culture?

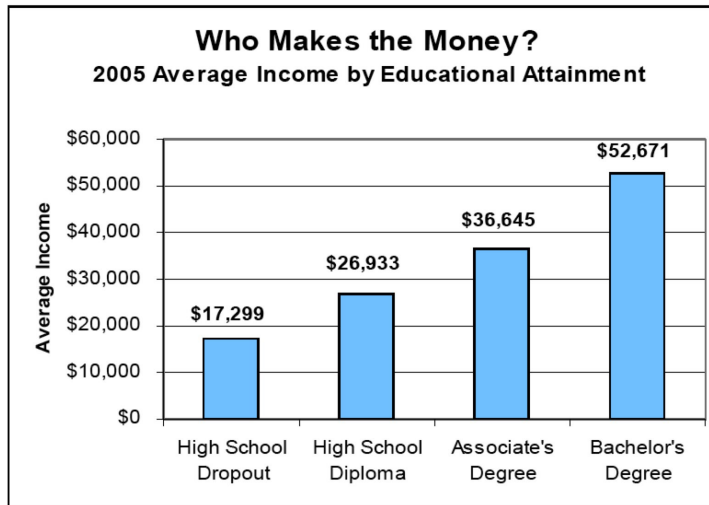
High schools also label students through sports competitions, drama productions, music competitions, student leadership and dozens of other extra curricular activities. Competition may provide positive learning experiences for the winners. But, what about the “losers”? Making selections on talent and ambition is appropriate in some circumstances, but large high schools only have limited opportunities for students to “win” and further develop their talents and be recognized. When this happens, large numbers of students drift through high school with little purpose and see their school as a place for other students.

High schools can be proud of the thousands of students who are able to negotiate leveled courses, participate in challenging learning experiences, compete in contests, set goals, and use their secondary education as a stepping stone to success. But, for the sake of the thousands of students who do not benefit from the current high school system, educators need to ask: Should schools continue to sort and label “winners” and “losers” as part its overall culture?

High School as the Starting Point

A diploma is the minimum requirement for nearly all jobs today. The military also requires a diploma as an indication of preparation for the advanced skills required of soldiers and support personnel. A diploma also means more money. High school graduates are likely to have substantially more income over their lifetime and attain a higher standard of living.

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Source: U.S. Bureau of the Census, 2006

A recent study by Bridgespan Group, a nonprofit consulting firm, emphasizes the importance of high school completion and preparation for college. Using national statistics, it states:

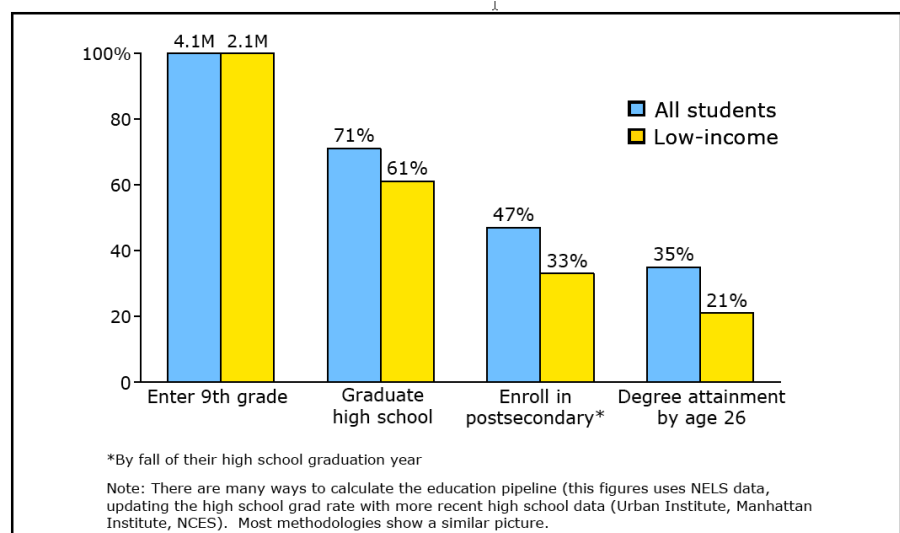
Bedsworth, W. et al. *Reclaiming the American Dream*

- High school dropouts are four times more likely to be unemployed than college graduates.
- High school dropouts are 2.5 times more likely to be arrested than high school graduates.
- Only half of the students who enter 9th grade will enroll in college.
- The level of math taken in high school strongly correlates with college completion.
- Only 14% of high school students who do not meet a rigorous standard of academic preparedness will graduate from college.

Disturbing as these aggregate numbers are, the picture for low-income students is even more dismal. Only 60% of America's low-income youth (students eligible for free and reduced meals)

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graduate from high school. One in three enroll in college. Only one in seven will earn a bachelor's degree. The following chart shows the loss of students in the education pipeline.



The study identifies and ranks “college-access supports,” meaning factors other than academic preparedness that influence the likelihood of students earning a college degree. The study concluded that the two most critical supports are (1) an awareness of the link between college and career aspirations and (2) positive attitudes toward college attendance among a student’s closest peer group. Parental involvement and assistance with the college application process were rated less significant. The study concludes that every high school needs to develop a culture in which college “is not only a possibility, but an expectation.”

Challenging Our Students

Yet, many high school students drift through school with little preparation, and many staff complain that students show little interest, miss school, fail to do assignments and are generally

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disengaged. While these behaviors are frustrating, it is not simply a problem of blaming students. A few years ago, the National Governors Association (NGA) completed a policy report on the issues of high schools. Part of that project was an extensive and unique effort to listen to students. The *Rate Your Future* survey was designed to give governors valuable insight into today's high school experience. NGA received more than 10,000 completed surveys taken by high school students nationwide. The survey let students express their expectations and frustrations about America's high schools and how the work they do affects their own future.

National Governors
Association, *Rate
Your Future.*
Available online at
www.nga.org

Of students who plan to graduate from high school, less than one in 10 say high school has been "very hard." More than one-third say high school has been "easy." More than 32% "strongly agree" they would work harder if high school offered more demanding and interesting courses. More than 70% think taking courses related to the kinds of jobs they want is the best way to make their senior year more meaningful.

According to a recent Educational Testing Service (ETS) poll, only 9% of Americans think most high school students are being challenged by their schoolwork. Three-quarters of respondents also said America's ability to compete in the world will weaken if 25 years from now high schools have not changed. They also felt the following actions should be taken.

- Teachers need ongoing support to be experts in the subjects they teach (74% agree).
- Teacher salaries should be increased so more well-qualified teachers can be hired and retained, even if it means increased taxes (80%).
- Schools need to emphasize real-world learning opportunities in high school through work study community service, and career technical courses (64%).

Peter D. Hart
Research Associates
and the Winston
Group. *Ready for
the Real World?
Americans Speak on
High School Reform*

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- Students should pass a state graduation test before they can receive a diploma (80%).
- All students should get rigorous coursework before graduation, including computer science (95%), four years of English (85%), three years of history and civics (81%), four years of mathematics (73%), at least three years of science (69%), and two years of foreign language (63%).

Wyner, J. et al.
Achievementtrap: How America Is Failing Millions of High-Achieving Students from Lower-Income Families

The situation for students not achieving their potential is highlighted even more dramatically in the report *Achievementtrap: How America Is Failing Millions of High-Achieving Students from Lower-Income Families*. The research in the report shows strong evidence that lower-income high school students are less likely to remain or become high-achieving students than those from upper-income backgrounds. For example, 28% of the poorest students slip out of the top achievement quartile in math compared to 14% of the wealthiest students. This difference between higher- and lower-income high achievers is in large part driven by the socioeconomic gap among boys. In math, 13% of the higher-income boys fall out of the top quartile of achievement compared to 25% of lower-income boys. Similarly in reading, 25% of higher-income boys fall out of the top quartile of achievement during high school compared to 36% of lower-income boys.

Dropout Factories

Samuels, C.
“Lack of Research, Data Hurts Dropout Efforts”

Researchers at Johns Hopkins University analyzed 2007 high school dropout data for the Associated Press that identified almost 2,000 high schools (which make up about 13% of all such schools in the U.S.) in which no more than 60% of its freshmen graduate as seniors. Bob Balfanz, lead researcher of the data analysis project describes these schools as “dropout factories.” These schools tend to serve large numbers of minority and low-income students, and have fewer resources and less-qualified teachers than schools

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in more affluent neighborhoods with larger numbers of white students.

Close to 40% of African-American students and 33% of Latino students attend these dropout factories, which turn out 51% of the nation's dropouts. "They produce 81% of all Native American dropouts, 73% of all African-American dropouts, and 66% of all Hispanic dropouts," according to the analysis. This is powerful data. In addressing the persistent failure of these high schools, we can fundamentally improve education outcomes for all students and better their impact on America's society.

There are huge economic costs for dropouts and society.

There are huge economic costs for dropouts and society. Research shows that high schools graduates earn 50% more than nongraduates, and a two-year college graduate makes more than twice as much as a high school dropout. The Alliance for Excellent Education has estimated that the approximately 1.2 million students who should have graduated with the Class of 2007 will cost the nation nearly \$329 billion in lost income over the course of their lifetimes.

Students can tell us a great deal about dissatisfaction with school and what would increase the level of their interest in academic studies. Thousands of students are disengaged and behave in ways that show a total disregard for the purpose and practices of schools. Violence and antisocial behavior captures headlines through dramatic events such as school shootings or influence of gangs, but these are isolated events affecting only a small number of students. More alarming are student behaviors that show significant disengagement and lack of interest in school-based learning. Many students go through the motions of showing up at school but fail to complete any productive work, while others drop out and end their formal education. According to the Alliance for Excellent Education, every year in the United States:

Student Dissatisfaction

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Alliance for Excellent Education. www.all4ed.org/about_the_crisis

- About 1.2 million students each year do not graduate from high school on time.
- About 70% of students earn their high school diplomas.
- Fifty-seven percent of Hispanic, 53.4% of African-American, and 49.3% of American Indian and Alaska Native students graduate with a regular diploma compared to 76.2% of white students and 80.2% of Asian Americans

The Silent Epidemic

Bridgeland, J. et al. *The Silent Epidemic: Perspectives of High School Dropouts*

The report, *The Silent Epidemic: Perspectives of High School Dropouts*, examines why students drop out of high school. Although some of the 500 dropouts surveyed had experienced academic problems, the vast majority said they left school because:

- classes weren't interesting (47%)
- they missed too many days and could not catch up (43%)
- they had too much freedom and not enough rules in life (38%)

The study, in which students could check more than one category, also looked at factors that dropouts thought might have kept them in school, including:

- more real-world learning opportunities (81%)
- smaller classes with more individual instruction (75%)
- better communication between parents and schools and more involvement from parents (71%)

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The Silent Epidemic

Statistics and Facts About High School Dropout Rates

- ✓ Every 29 seconds another student gives up on school, resulting in more than one million American high school students who drop out every year.
- ✓ Nearly one-third of all public high school students — and nearly one half of all African-Americans, Hispanics, and Native Americans — fail to graduate from public high school with their class.
- ✓ There are nearly 2,000 high schools in the U.S. in which 40% of the typical freshman class leaves school by its senior year.
- ✓ The dropout problem is likely to increase substantially through 2020 unless significant improvements are made.
- ✓ Dropouts are more likely than high school graduates to be unemployed, in poor health, living in poverty, on public assistance, and single parents with children who drop out of high school.
- ✓ Dropouts earn \$9,200 less per year than high school graduates and more than \$1 million less over a lifetime than college graduates.
- ✓ Dropouts were more than twice as likely as high school graduates to slip into poverty in a single year and three times more likely than college graduates to be unemployed in 2004.
- ✓ Dropouts are more than eight times as likely to be in jail or prison as high school graduates.
- ✓ Dropouts are four times less likely to volunteer than college graduates, twice less likely to vote or participate in community projects, and represent only 3% of actively engaged citizens in the U.S. today.
- ✓ The government would reap \$45 billion in extra tax revenues and reduced costs in public health, crime, and welfare payments if the number of high school dropouts among 20-year-olds in the U.S. today, which numbers more than 700,000 individuals, were cut in half.

Source: www.silentepidemic.org

Giving Students a Voice

By the time they reach high school, students are keenly aware of the many issues that affect them in school and society in general — issues that range from getting good grades to discrimination and violence. However, how many of us really know what students think when it comes to school and beyond? Do we know their fears, dreams, and aspirations? As educators, we want to make a difference in the lives of students. But would students agree?

To gain insight into whether students perceive their schools as places in which they are known, supported, challenged, and inspired, the Quaglia Institute for Student Aspirations (QISA) developed the *My Voice*® Student Aspirations Survey. The survey asks students to respond to a series of statements that reflect students' aspirations and their personal, social, and academic development. The International Center partnered with QISA in administering the survey to identify and analyze the nation's most successful education practices and policies.

While most students surveyed want to do well in school, many do not put forth the effort needed to achieve to their fullest potential.

During the 2006-07 academic year, 53,898 students completed the survey as part of a five-year initiative by the International Center and the Council of Chief State School Officers (CCSSO), with support from the Bill & Melinda Gates Foundation, to identify, analyze, enrich, and disseminate the nation's most successful schoolwide practices and policies. The schools represented various sizes and socioeconomic backgrounds from 10 states. Of the students surveyed, 7% were in grades 6-8 and 93% were in grades 9-12. Of the students surveyed, 51% were male and 49% were female. The participants were from a range of ethnic backgrounds: Caucasian (43%), African-American (11%), Hispanic/Latino (26%), Native American (1%), South Asian (5%), Chinese (5%), and other (8%). The survey revealed both positive and negative findings. While most students surveyed want to do well in school, many do not put forth the effort needed to achieve to their fullest potential. Close to 20% of those surveyed give up when they encounter difficult schoolwork. Similarly, only three out of five students report that they try their best in school, a finding that is strikingly similar to the three out

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of five who state that teachers recognize them when they try their best. The gap between wanting to achieve and persevering to meet that goal must be examined, as does the role that teachers play in recognizing effort and perseverance.

To be engaged in learning and want to persevere, students must find their studies enjoyable and worthwhile. Of the students surveyed, 53% said that they enjoy being at school and 55% said that they enjoy participating in their classes. While 65% agreed with the statement that “learning can be fun,” 44% said that “school is boring.”

Selected Responses to the My Voice Survey

Question	Percentage Agree
Teachers care about me as an individual.	47%
If I have a problem, I have a teacher with whom I can talk.	48%
Students respect teachers.	42%
Students respect each other.	32%
I give up when schoolwork is difficult.	20%
I enjoy being at school.	53%
I put forth my best effort at school.	67%
I enjoy participating in my classes.	55%
School is boring.	44%
At school I am encouraged to be creative.	57%
Learning can be fun.	65%
I enjoy learning new things.	76%
Teachers help me learn from my mistakes.	56%

The Disconnect Between High School and Higher Education

Several national studies confirm the insufficient preparation of high school graduates for either college-level work or the changing needs of the workforce. High school achievement rates are weak and barely have increased in the last decade. The education achievement levels of young people who do complete high school are simply not high enough to allow them to succeed in college. According to the National Assessment of Educational Progress (NAEP), only 17% of seniors are considered proficient in mathematics, and just 36% are proficient in reading.

While the majority of high school teachers believe that meeting state standards prepares students for college-level work, most postsecondary instructors disagree, according to the *ACT National Curriculum Survey Results 2005-2006*. Among the findings:

- Of high school teachers, 74% said that meeting state standards prepares students for college-level work.
- Of postsecondary instructors, 65% said that state standards prepare students poorly or very poorly for college-level work.

Braswell, J. *et al.*
*The Nation's Report
Card: Mathematics*

Grigg, W. *et al.* *The
Nation's Report Card:
Reading*

Here are the findings broken down by subject:

- In English, 76% of high school teachers said that meeting state standards prepares students for college-level work, while 33% of postsecondary instructors thought the same.
- In reading, 72% of high school teachers said that meeting state standards prepare students for college-level work. Only 36% of postsecondary instructors agreed.
- In math, 79% of high school teachers said that meeting state standards prepares students for college-level work, while 42% of postsecondary instructors believed this to be true.

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- In science, the percentages were 67% of high school teachers and 32% of postsecondary instructors.
- Of high school teachers, 95% said they are familiar with their state's standards, while 59% of postsecondary instructors said the same.
- Of high school teachers, 32% said that students today are better prepared for college-level work, while 13% of postsecondary instructors agreed.

Although high school teachers tend to have a more positive view of state standards, the majority of both groups (68% of high school teachers and 86% of postsecondary instructors) think that student preparation today for college-level work is the same or worse than student preparation five to 10 years ago.

Adding more state standards to prepare students for college-level work is not the answer, according to ACT, the not-for-profit education organization that published the survey. In fact, high school educators should consider incorporating fewer and more targeted state standards that are focused on the essential knowledge and skills in each content area instead of many standards covering a broad array of topics and skills. This could bring state standards more in line with what postsecondary schools require of entering freshmen.

The statistics just discussed show that a major obstacle to our national student achievement problem is insufficient alignment between K-12 and higher education. Studies show the majority of both college and high school faculty and administrators are unaware of the standards and assessments being used by their counterparts in the other sector. For example, only eight states require high school graduates to take at least Algebra II — a threshold course for college-level success in math-based disciplines, including

*Achieve.org. Closing
the Expectations Gap*

*ACT. Crisis at the
Core: Preparing All
Students for College
and Work*

Sanoff, A. "A Perception Gap Over Students' Preparation"

Breneman, David and Robert Costrell. *Remediation in Higher Education*

engineering and science. Fewer than 22% of the 1.2 million students who took the ACT college-entrance examinations in 2004 were ready for college-level work in the core subjects of mathematics, English, and science. In addition, 44% of faculty members say students aren't well prepared for college-level writing in contrast to the 90% of high school teachers who think students are prepared.

Remediation has become far too common an experience for American postsecondary students. About 40% of all college students take at least one remedial course — at an estimated cost to the taxpayers of \$1 billion. Additionally, industry spends significant financial resources on remediation and retraining.

Redefining Rigor

Schools can only prepare students to compete in the global economy by educating them with relevant 21st century skills.

The critical importance of providing students with the rigorous and relevant education that they need to not only survive, but to thrive in the global economy, cannot be overstated. The skills needed today are not the same as they were 50, 10, or even five years ago. The Information Age is about continuous progress and innovation. The externalization, standardization, and collaboration that technology fosters essentially make the world a smaller place. Considering that computers are becoming more "intelligent" and less reliant on human interaction, all that is left is the sobering realization that the need for low- and medium-wage earners will decline dramatically in this country.

Today's students are already the most technologically proficient and collaborative group of individuals the United States has ever produced. If American education continues to emphasize rigor for outdated 20th century standards, it is doing its young people a disservice. Schools can only prepare students to compete in the global economy by educating them with relevant 21st century skills. Introducing innovative technologies into educational settings will cater to students' learning styles and further their willingness and enthusiasm to learn as they better understand the connection between the classroom and their lives outside of it.

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Working in the context of a digital society requires breakthrough thinking. Today's students will have to work harder, faster, and smarter than their predecessors to enjoy success in adult life. Schools need to reinvent themselves to prepare students to meet the future demands that will be placed upon them. Today's technology will be tomorrow's "antiques," and it is not an exaggeration to say that more extensive scientific and technological advances will occur in the next few years than have happened in the last two centuries. Dealing with these advances requires a different education system from the one in which we were educated, the same traditional system that remains in place in many schools today.

Schools need to reinvent themselves to prepare students to meet the future demands that will be placed upon them.

One national organization, the Partnership for 21st Century Skills, aims to draw attention to changes that should be made in the high school curriculum based on the future needs of students in the workplace and society. The organization brings together the business community, education leaders, and policymakers to define a vision for an up-to-date education and to ensure that students leave schools with the skills needed to be effective citizens, workers, and leaders. To promote this vision, the Partnership has issued numerous reports, including *Learning for the 21st Century* and *Assessment of 21st Century Skills: The Current Landscape*. The organization also has a Web-based repository for information on assessments, a self-assessment guide, and other resources and educational tools.

In one report, *Results That Matter: 21st Century Skills and High School Reform*, The Partnership outlines a framework to educate today's high school graduates. The framework emphasizes the importance of rigor and relevance. According to the report, creating high schools that truly will improve learning demands a clear understanding of the knowledge, skills, and attributes that today's students need to be successful.

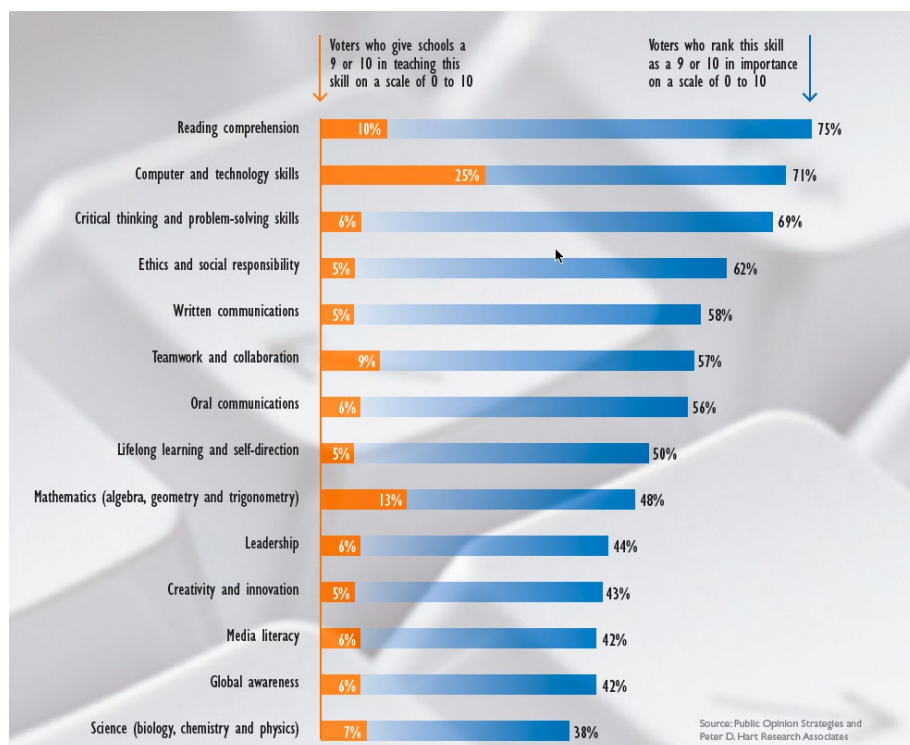
Chapter 1 The High Schools We Need

Partnership for 21st Century Skills. *Results That Matter*. Available at www.21stcenturyskills.org

The Partnership found that improving high schools requires the nation to redefine rigor to encompass not just mastery of core academic subjects, but also mastery of 21st century skills and content. Today's graduates need to be critical thinkers, problem solvers, and effective communicators who are proficient in both core subjects and new content and skills. New and essential areas of skill development include information and communications technology, literacy, and personal skill development (life skills).

As part of its work, the Partnership conducted a nationwide poll of registered voters. The survey revealed that Americans are deeply concerned that the United States is not preparing young people with the skills they need to compete in the global economy. An overwhelming 80% of voters say that the skills students need to learn to be prepared for the jobs of the 21st century are different from what they needed 20 years ago. In the following chart, voters rated the importance of these skills and also rated the schools in teaching these skills.

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Source: Public Opinion Strategies and Peter D. Hart Associates

The National Association of Secondary School Principals (NASSP), following its 1996 report *Breaking Ranks: Changing an American Institution*, produced *Breaking Ranks II*, which is designed to engage principals, teacher leaders, and the entire school community in reforming secondary schools into academically rigorous, personalized learning environments. Where the initial *Breaking Ranks* report presented a vision of a dramatically different high school for the 21st century, *Breaking Ranks II* takes a step

What Should High Schools Encompass?

NASSP. *Breaking Ranks: Changing an American Institution*

NASSP. *Breaking Ranks II: Strategies for Leading High School Reform*

further by outlining tested strategies for positive change that have proven successful in all types of school settings. *Breaking Ranks II* is a guide developed to improve learning experiences through illustrations of entry points to begin the process of change, strategies for implementation, and profiles of successes and challenges.

The guide focuses on three core areas that schools must address: (1) collaborative leadership, professional learning communities, and the strategic use of data; (2) 31 recommendations for redesign clustered in the three key areas, and (3) seven cornerstone strategies for getting started in improving student achievement. These seven cornerstone strategies are:

1. **Core knowledge.** Establish the essential knowledge a student is required to learn in order to graduate, and adjust the curriculum and teaching strategies to realize that goal.
2. **Connections with students.** Increase the quantity and improve the quality of interactions between students, teachers, and other school personnel by reducing the number of students for which any adult or group of adults is responsible.
3. **Personalized planning.** Implement a comprehensive advisory program that ensures each student has frequent and meaningful opportunities to plan and assess his or her academic and social progress with a faculty member.
4. **Adapting to differences.** Ensure teachers use a variety of instructional strategies and assessments to accommodate individual learning styles.
5. **Flexible use of time.** Implement schedules flexible enough to accommodate teaching strategies consistent with the ways

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students learn most effectively and that allow for effective teacher teaming and lesson planning.

6. **Distributed leadership.** Institute structural leadership changes that allow for meaningful involvement in decision making by students, teachers, family members, and the community at large and that support effective communication with these groups.
7. **Continuous professional development.** Align comprehensive, ongoing professional development programs and individual personal learning plans of staff members with the content knowledge and instructional strategies required to prepare students for graduation.

Seven major meta-analysis studies have been done in recent years on school reform. Following is an outline of the characteristics of successful schools that came out of each of these analyses.

1. Ronald Edmonds was the leading researcher in school reform in the 1970s, and his work is still highly respected by education leaders. He created what is now known as the “effective schools model.” Edmonds’ research detailed the five following characteristics of successful schools:
 - Strong administrative leadership
 - Focus on basic skills
 - High expectations for student success
 - Frequent monitoring of student performance
 - Safe and orderly schools
2. Jaap Scheerens and Roel Bosker’s work was well recognized and embraced in the mid- to late 1990s. They did research on a

Meta-Analysis Studies on School Reform

Edmonds, R.
“Search for Effective
Schools”

Scheerens, J.
and R. Bosker.
*The Foundations
of Educational
Effectiveness*

Chapter 1 The High Schools We Need

wide variety of school reform initiatives and came up with eight essential characteristics of successful schools.

- Monitoring of student progress
- Focus on achievement
- Parental involvement
- Creating a safe and orderly climate
- Focused curriculum
- Strong leadership
- Cooperative working environment
- Time on task

U.S. Department
of Education. *Key
High School Reform
Strategies*

3. For the 1999 report, *Key High School Reform Strategies: An Overview of Research Findings*, a team of researchers studied the 300 most comprehensive school reform research studies done in the previous five years. The researchers identified the following common characteristics:

- Commitment to high academic expectations
- Small learning environments
- Structure learning around student interest and career
- Professional development focused on instruction
- Tie out-of-school learning to classroom learning
- Career and higher-education counseling
- Flexible, relevant segments of instruction
- Assess on what students can do
- Partnerships with higher education
- Support alliances with parents and community

Marzano, R.J. *What
Works In Schools –
Translating Research Into
Actions*

4. In reviewing research on school reform in his book, *What Works in Schools – Translating Research into Action*, published in 2003, Robert Marzano identified five characteristics:
- Guaranteed and viable curriculum
 - Challenging goals and effective feedback

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- Parent and community involvement
- Safe and orderly environment
- Collegiality and professionalism

5. In June 2000, Doris and Custer Quick, International Center Senior Consultants, did an analysis of five models of high-achieving schools. They studied the *90-90-90 Schools*, *No Excuses Schools*, *Benchmark School Study*, the *Hope for Urban Education Study*, and the *Beating the Odds Study*. They reviewed the characteristics that each of these major studies found to be central to student success and established the following five overriding characteristics:

- Commitment to a rigorous and relevant curriculum for all students
- Implementation of a testing program that evaluates both students' conceptual knowledge and their ability to apply knowledge
- A focused and sustained staff development program
- Commitment to addressing the issue of student behavior
- Willingness to make organizational changes for the benefit of students

6. The Bill & Melinda Gates Foundation has made a major commitment to school reform, especially at the secondary school level, following an extensive review of the research on the components of successful schools. The Foundation identified the following characteristics as most important for school reform:

- A common focus on a few research-based goals
- High expectations
- Small, personalized learning environment
- Respect and responsibility for all

Quick, C. and D.
Quick, *High Poverty*
– *High Success:*
Schools that Defy the
Odds

The Bill & Melinda Gates
Foundation Education
Targeted Literature
Review of Major
Constructs and Their
Components: Evaluating
the National School
District and Network
Grant Program

Lezotte, L.W. *et al.*
Effective Schools –
Only You Can Make
a Difference

- Parent/community partnerships
 - Focus on performance
 - Effective use of technology tools
7. In expanding the leadership research that Ron Edmonds started in the 1970s, Larry Lezotte described the following as the most important characteristics of effective schools:
- Creating the school culture
 - The correlates of effective schools
 - Site-based management
 - Data collection, disaggregation, and analysis
 - School improvement plan process
 - Organizing schools for students
 - Building community support
 - Evaluation of student progress

10 Components of Successful School Reform

To simplify the research from the seven meta-analysis studies, the International Center aligned the common characteristics among all the studies to form the 10 Components of Successful School Reform.

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10 Components of Successful School Reform

Components	Edmonds	Scheerens & Bosker	USDOE	Marzano	Quick & Quick	Gates	Lezotte
Create a culture					Rigor and relevance for all Willingness to change		Creating the school culture
Use data to set instructional practices	Focus on basic skills	Focused curriculum		Guaranteed and viable curriculum		Common focus on few research-based goals	Data collection, disaggregation and analysis
Application			Structured learning around student interest and career		Commitment to rigor and relevance		Organizing schools for students
Framework to organize curriculum			Classroom instruction tied to out-of-school learning Flexible, relevant segments of instruction				Organizing schools for students Correlates of effective schools
Multiple pathways			Small learning communities			Small personalized learning environment	
High expectations with accountability	High expectations Monitoring student performance	Focus on achievement Monitoring student progress	Commitment to high expectations Assess what students can do	Challenging goals and effective feedback	Test both knowledge and application	High expectations Focus on performance	Evaluation of student progress
Professional development			Professional development focused on instruction		Focused staff development		
Parent and community		Parental involvement	Support alliance with parents	Parent and community involvement		Parent/ community partnership	Building community support
Safe and orderly schools	Safe and orderly schools	Creating a safe and orderly environment		Safe and orderly environment	Address student behavior	Respect and responsibilities for all	
Leadership development	Strong administrative leadership	Strong leadership		Collegiality and professionalism			Site-based management
Other		Cooperative learning environment Time on task	Career and higher-education counseling Partnerships with higher education			Technology tools	School improvement plans

Nine Key Characteristics of Successful Schools

In 2004, through feedback from several schools, it became apparent that, although the meta-analysis research was valuable and appreciated, the most urgent need was a series of specific characteristics that schools could readily adopt for the short term. In turn, the International Center, in conjunction with the Council of Chief State School Officers and with financial support from the Bill & Melinda Gates Foundation, conducted a study on the most successful high schools in the country, paying close attention to their feeder elementary and middle schools, to try to understand the characteristics that made them effective schools. This investigation, coupled with the analysis of all the characteristics outlined in the research described in the previous section, led the International Center to establish nine key characteristics of high performing high schools:

1. **Small learning communities.** Instruction is focused around students' interests, learning styles, and aptitudes through a variety of small learning community approaches — most commonly academies.
2. **High expectations.** Administrators and teachers share an unrelenting commitment to excellence for all students, especially in the area of literacy.
3. **An major emphasis on 9th grade.** An extraordinary commitment of resources and attention are offered to 9th grade students.
4. **A challenging 12th grade.** Students are engaged and academically challenged in their last year of high school.
5. **Data.** Daily instructional decisions for individual students are based on sound data.
6. **High-quality curriculum.** Instruction is based on rigor and relevance.

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7. **Relationships and reflective thought.** Schools provide students with adults with whom they can develop personal relationships and be allowed the opportunity to use reflective thought.
8. **Professional development.** Schools focus and maintain professional development around a limited number of high-impact initiatives.
9. **Leadership.** There is solid and dedicated leadership.

Small Learning Communities

Small learning communities were found in nearly all of these schools. The schools were not selected for this reason, but rather because the students were outperforming similar groups of peers in other schools. A small learning community provides the platform to focus instruction around student interests, learning styles, and aptitudes. Whatever approach schools take to the “smaller is better” idea, they construct themselves so that somehow students personally connect to the school, identify with a small group of teachers and fellow learners, form personal relationships, and are noticed and included. They don’t get lost. Small communities permit educators to develop a personal relationship over an extended period of time with students. They enable outside mentors, business partners, and others to create personal relationships with the faculty and students. These personal relationships prove to be essential in motivating and nurturing students.

Simply creating a small learning community, however, without addressing the other characteristics of school reform will not lead to improved student performance. In other words, small learning communities allow many changes to take place, but do not provide

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the changes in themselves. Without this realization, small learning communities will become one more fad that did not take root to fundamentally change the American education system, and we will have missed the opportunity this innovation can provide.

High Expectations

High-performing schools believe that all students can and must achieve high standards. They have a few academic priorities and do them well. They recognize that the *No Child Left Behind Act*, adequate yearly progress (AYP), and state testing programs create the floor for what all students need to achieve. In other schools, this floor all too often becomes the ceiling; if the students have passed the state tests, they have achieved academic excellence. However, high-performing schools believe that passing the test is the minimum standard and is far from the definition of academic excellence.

Highly successful schools take the time up front to create a clear understanding among students, parents, faculty, and the general public as to *why* high standards are essential for all students. Jobs for the unskilled are disappearing in this country. Simply obtaining admission to college — where a large percentage of students begin by taking remedial courses — is not a definition of excellence.

In addition, these schools believe that all students can learn, but they recognize that a wide variety of delivery and support systems must be put in place to enable students to achieve their potential. Given the support structures, they believe that students will achieve high standards.

Moreover, while they focus on the need for high standards in all subjects, they make the greatest effort to stress the need for

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excellence in the area of literacy. These highly successful schools also make a deep commitment to creating personal relationships with students that will help nurture, motivate, and guide them. Teachers know their students and often their families well. These strong relationships help create an environment that enables all students to achieve much higher standards compared to schools that don't place an emphasis on relationship building.

A Major Emphasis on 9th Grade

Ninth grade in many of these successful schools are dramatically different from the same grade in other schools. Students' academic levels are analyzed as they enter their freshman year. If they do not have adequate academic skills to succeed in the high school curriculum, they are enrolled in an enrichment program. Enrichment, a more encompassing process, is used rather than remediation practices. Other schools typically use traditional remediation for students, often with limited success in improving performance.

Some schools begin the small learning community approach around a thematic area of interest to the student as part of the enrichment program. The thematic program might be in the arts, environmental science, construction, and so forth. The students take intensive reading, writing, and mathematics courses that use the thematic area as the content for developing students' skills. The motivation of the students in these enrichment programs is remarkably different from students in the remedial programs. However, some degree of drill-and-skill approach is still necessary to get struggling students to pass the state tests.

By the end of grade 9, these students typically have made dramatic improvements in their basic skills, enabling them to complete a normal high school curriculum. They also have been indoctrinated

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into the culture of high expectations and caring adults. When grade 9 is used for enrichment, the normal four-year high school curriculum needs to be collapsed into three years in grades 10-12. In most high schools, this is possible because the senior year has a limited number of required courses. Furthermore, students often do not have a full slate of required courses in grade 11. Therefore, teachers continue to use the thematic approach of the small learning community to teach academics. In effect, these schools trade off elective courses for the election of a thematic approach to teaching academics. Upper-class students serve as mentors to 9th grade students. These upperclassmen model expected behavior, provide ongoing guidance to freshmen and in many cases tutor struggling students.

A Challenging 12th Grade

Twelfth grade can be a very different experience in these schools as well. For students who entered 9th grade with adequate academic preparation for high school, the four-year program may also be collapsed into three years. These students complete most of the normal high school curriculum by the end of grade 11. They then use grade 12 as an “advanced placement” year. Through strong articulation with higher education, many of these students are then able to earn up to 30 college credits by the time they graduate from high school.

There are a wide variety of students between those who need the enrichment program in grade 9 and those who can complete upward of 30 college credits by grade 12. Some students can complete a few advanced placement credits and some need only a minimal amount of help to catch up. Academies, based on themes, career interests, and aptitudes, also can be used to teach these students.

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Data

The schools have a laser-like focus on data that assists classroom teachers in making daily decisions about instruction. Teachers are able to identify which of their state standards, benchmarks, and student expectations are essential. They use a wide variety of data sources, such as MetaMetrics' Lexile Framework for Reading, to analyze where students' present performance levels are, how those performance levels compare to the instructional materials students use in the classroom, and the performance levels required of students once they graduate from high school. Only essential data is collected. It is then used in making instructional decisions and is communicated to students, parents, and other stakeholders on an ongoing basis.

High-Quality Curriculum

During the past several years, state education departments have struggled with fewer financial resources, leading to retrenchment of staff. All too often that retrenchment has resulted in the loss of curriculum and instruction specialists. A similar trend has occurred in large school districts. This circumstance has led to a decrease in the development of quality curricula and instructional materials throughout this country. Teachers have fewer instructional resources than in the past. The textbook has become the curriculum, or educators must rely on their state standards, which are not the same as a curriculum or instruction, to guide them.

By contrast, successful high schools have a high-quality curriculum to guide instruction. They also have moved beyond the curriculum to create an instructional framework that enables students to develop skills and learn to apply those skills to various situations. Teachers across disciplines know, respect, and interact with each other on an

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ongoing basis. Business and postsecondary partnerships further enrich instructional practices.

In many of these schools, students are given time to reflect on the knowledge they are gaining and the applications of that knowledge they are trying to utilize. In addition, teachers are given time for reflective thought, using good data to make decisions about what and how to teach.

Relationships

In high-performing schools, relationships are driven by guiding principles, which include respect, responsibility, honesty, trustworthiness, compassion, loyalty, optimism, adaptability, courage, contemplation, initiative, and perseverance. Such principles create a culture that permits learning to occur. They exist in relationships between teacher and student, teacher and teacher, student and student, school and parent, school and community, and all other relationships that affect teaching and learning. When they exist, guiding principles enable instruction to be more orderly, meaningful, and successful.

Professional Development

Providing an environment in which optimal learning can take place cannot happen without quality teaching practices. Therefore, any effort to keep teachers on top of their game must be seen by everyone as important. Furthermore, any professional development effort must be sustainable over time and integrated with what is happening in the classrooms. The most important areas to address when planning professional development programs are effective use of data, differentiated instruction, and respectful behavior.

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Quality professional development for teachers is guided by the same principles as quality education for students. It is teacher-centered, rigorous, relevant, collaborative, supported, and sustained. Professional development is not a series of events and workshops; it is a mindset, with professional staff constantly learning and growing as individuals and career professionals.

Leadership

Leadership is key in highly successful high schools. Effective leaders have solid skills, are well focused, and remain in a position long enough to sustain change within the school. For teachers to sustain the high level of commitment needed to support every student at every level, they need the support of effective leadership: an administrator who is a “port in the storm” of the day-to-day drama of classrooms filled with blossoming adolescents, lesson plans and activities, parental concerns, and more. When, in the middle of this, a leader is present who is able to offer a clear direction, teachers become more successful in keeping their larger goals in view. Interestingly enough, with this kind of leader in place, staff changes decrease at administrative, instructional, and support levels. This, in turn, makes for a more stable environment for students, which also contributes to their success.

For teachers to sustain the high level of commitment needed to support every student at every level, they need the support of effective leadership

Qualities inherent in true leadership are:

- a visible (though not necessarily flashy) enthusiasm and energy
- solid administrative, organizational, and communication skills
- a clear focus that remains intact, regardless of shifting political or situational winds

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- the ability to use data in everything from numbers on attendance and discipline to scores reflecting literacy and mathematical achievement to percentages of students involved in extracurricular activities
- the ability to create a climate that reflects the underlying principles of respect and responsibility for, and from, all students

In the business world, the heads of organizations must model the expressed values of the place they are leading in the way they design the goals, treat the staff, and think about their customers. Schools are no different.

Summary

Today, high schools in this country are institutions that struggle with the traditions of the past while striving to prepare all youth for life outside of school. Public education serves many purposes, namely to teach students basic literacy and prepare them for postsecondary education, employment, and citizenship. High schools were originally designed to meet these purposes, but also to select and sort the “top” students capable of continuing their learning in a postsecondary education environment.

Moreover, high schools were designed for time when people typically had lifetime jobs that required predictable skills performed in a familiar environment. Over the past 40 years, our society and economy have gone through dramatic changes that require workers to possess different sets of skills from those that high schools have traditionally provided.

As the demands to raise standards have become steeper, the tendency has been to rely on the old tried-and-true curriculum content and teaching approaches. The problem is, of course, that the old methodology doesn’t work when it comes to helping *all* students reach high standards of proficiency.

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This does not mean that we tear down schools and start fresh. There is much to be preserved in the American high school. However, we must question old assumptions, create new solutions, and never settle for promoting the status quo because it is comfortable.

There is nearly universal agreement that preparation for the future requires a strong academic base. This base, which is now being played out by state tests, is what often is referred to as “academic rigor.” The reality, however, is that state exams really do not measure academic rigor, but rather they measure basic academic skills. These tests are the starting point of education, not the finish line.

Successful schools focused on the future and collaborate as teams to continuously improve. The goal is to teach students how to think — not simply what to know. They help students learn to apply high levels of cognitive knowledge to real-world unpredictable situations. That means academic rigor is applied in open-ended ways that are relevant now. Minimum academic preparation should be the same for all, but the pathways and timeline for achievement must be personalized for each student. High schools must be more than a place for minimum academic preparation. Students need 21st century skills that equip them for future success. This is the kind of high school we need and our children deserve.

Achieve.org. *Closing the Expectations Gap* report, 2006. www.cte.mnscu.edu/researchcorner/Future%20Work/Closing%20the%20Expectations%20Gap%202006.pdf

ACT. *Crisis at the Core: Preparing All Students for College and Work* report. Iowa City, IA: 2005. www.act.org/research/policymakers/reports/crisis.html

ACT. *National Curriculum Survey 2005–2006*. Iowa City, IA: 2007. www.act.org/path/policy/pdf/NationalCurriculumSurvey2006.pdf

References

Chapter 1 The High Schools We Need

Alliance for Excellent Education. Web page: About the Crisis, 2007. www.all4ed.org/about_the_crisis

Aspen Institute Program on Education and Society. *Remaking Career and Technical Education for the 21st Century: What Role for High School Programs?* report, 2004

Bedsworth, W. et al. *Reclaiming the American Dream*. The Bridgespan Group, 2006. www.bridgespan.org/kno_articles_americanadream.html

Bill & Melinda Gates Foundation. *Targeted Literature Review of Major Constructs and Their Components: Evaluating the National School District and Network Grant Program* report, 2002. www.gatesfoundation.org/nr/downloads/ed/researchevaluation/GatesLitReview.pdf

Braswell, J. et al. *The Nation's Report Card: Mathematics 2000*. U.S. Department of Education, 2001

Breneman, D. and R. Costrell. 1998. *Remediation in Higher Education* report, 1998

Bridgeland, J. et al. *The Silent Epidemic Perspectives of High School Dropouts*, 2006

Edmonds, R. "Search for Effective Schools" NIE, East Lansing, MI. The Institute for Research on Teaching, College of Education, Michigan State University, 1981

Education Leadership. "Reshaping High Schools," May 2008

Grigg, W. et al. *The Nation's Report Card: Reading 2002*. U.S. Department of Education, 2003

Leading Change in High Schools

Lezotte, L.W. *et al. Effective Schools – Only You Can Make A Difference*. All Star Publishing, 2002

Marzano, R.J. (2003) *What Works In Schools – Translating Research Into Actions*. ASCD, 2003

National Association of Secondary School Principals (NASSP) *Breaking Ranks: Changing an American Institution* report. Reston, VA: 1996

NASSP. *Breaking Ranks II: Strategies for Leading High School Reform*. Reston, VA: 2004

NASSP. *Breaking Ranks in the Middle: Strategies for Leading Middle Level Reform*. Reston, VA: 2006

National Commission on Excellence in Education (1983). *A Nation At Risk* report. Washington, DC: U.S. Government Printing Office, 1983

National Governors Association. *Rate Your Future*. Washington, D.C.: 2005. www.nga.org

National Governors Association. (2007) “Retooling Career Technical Education” presentation at the American Youth Policy Forum. Washington, D.C., June 14, 2007

National School Boards Association. *Where We Learn* report. Alexandria, VA: 2006. www.nsba.org/site/view.asp?TRACKID=&VID=2&CID=1823&DID=38081

Partnership for 21st Century Skills. *Results That Matter: 21st Century Skills and High School Reform* report, 2006. www.21stcenturyskills.org

Chapter 1 The High Schools We Need

Peter D. Hart Research Associates and The Winston Group. *Ready for the Real World? Americans Speak on High School Reform*, 2005. www.ets.org/Media/Education_Topics/pdf/2005highschoolreform.pdf

Phipps, R. and the Thomas B. Fordham Foundation. *College Remediation: What It Is, What It Costs, What's at Stake* report. Washington, D.C.: Institute for Higher Education Policy, 1998

Quick C. and D. Quick. *High Poverty – High Success: Schools That Defy the Odds* report. International Center for Leadership in Education, 2002

Samuels, C. "Lack of Research, Data Hurts Dropout Efforts, Experts Say." *Education Week*, May 9, 2007

Sanoff, A. "A Perception Gap over Students' Preparation." *The Chronicle of Higher Education*, March 10, 2006

Scheerens, J. and R. Bosker. *The Foundations of Educational Effectiveness*, New York: Elsevier, 1997

U.S. Department of Education. *Key High School Reform Strategies: An Overview of Research Findings*, 1999

Venezia, A. et al. *Betraying the College Dream: How Disconnected K–12 and Postsecondary Education Systems Undermine Student Aspirations*. Stanford University's Bridge Project. Stanford, Calif.: Stanford Institute for Higher Education Research, 2003

Wyner, J. et al. *Achievementtrap: How America Is Failing Millions of High-Achieving Students from Lower-Income Families*. Kent Cooke Foundation, 2007



Chapter 2



Understanding the Dynamics of Change

Embracing Change

Change enriches our lives, but we still fear it. Or, more correctly, we fear being changed.

Anytime a student learns a skill or acquires knowledge, things are new and different. Because change is so much an integral part of learning, one would assume that educators would openly value and recognize the importance of change and embrace it as a natural part of learning. Unfortunately, habits are hard to break.

We all marvel at young children as they watch, listen, touch, and take in the world around them, constantly learning and enjoying every aspect of a new environment. But somewhere along the road in human development, we become comfortable with our routines. Newness and change becomes less inviting. We all prefer the comfort of what we know. We also become less confident in our ability to adapt to something new. On an intellectual level, we know that the most enjoyable experiences of our lives come from change – meeting a new person that ultimately becomes a partner, starting a new job, or buying a new home. Change enriches our lives, but we still fear it. Or, perhaps more correctly, we fear being changed. The changes that we are more likely to embrace are those that we feel we have some control over and with which some kind of option is available to us.

It is essential for school leaders to understand this emotional involvement in dealing with change. The challenge is not finding a best practice to implement, but rather to introduce a change in a positive way that allows staff first to embrace it and then channel their energies in the same direction to help promote it.

Why Change Fails

Many education initiatives have been unsuccessful, not because they were poor practices, but rather the process of introducing these practices failed.

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Poor Planning

- ✓ The need for change is not clear.
- ✓ There is no sense of urgency.
- ✓ Incompatibility exists in the organization.
- ✓ The change does not address the need.
- ✓ There is a lack of trust of senior management.
- ✓ There is a lack of respect for supervisors.
- ✓ Changes are made in secret.
- ✓ There is a lack of shared vision.

Poor Execution

- ✓ There is a lack of communication.
- ✓ There is a belief that changes will reduce staff and resources.
- ✓ There are no measurable outcomes.
- ✓ Key people do not advocate for the change.
- ✓ There is a negative impact on social relations.
- ✓ The initiative was introduced too quickly or too slowly.
- ✓ Vested interests are ignored.
- ✓ The cost is too high and the rewards too low.
- ✓ There is a lack of confidence and fear of failure.
- ✓ There are no rewards for change.
- ✓ There are no resources or structure for follow-through.



“It is not the strongest of the species that survives, nor the most intelligent, but the one most responsive to change.”

— Charles Darwin

Chapter 2 Understanding the Dynamics of Change

Change Is a Process

Lewin, K. "Frontiers in Group Dynamics

Before a change is implemented or even introduced, efforts need to be made to "unfreeze" an organization. This involves dismantling the current mindset.

One of the first researchers who wrote about the process of change was Kurt Lewin, who is considered the father of modern social psychology. He used a three-step model: *unfreezing*, *change*, and *freezing*. This simple representation of change, which became popular in the 1950s, often is cited in research. It is powerful in its simplicity, but also raises the important understanding that change is not an event, but a process that goes through phases.

Before a change is implemented or even introduced, efforts need to be made to "unfreeze" an organization. This involves dismantling the current mindset. Change will not work in an organization that is comfortable with the status quo. In the second stage, "change" involves the active role of transformation, which usually represents a period of transition as participants work to develop a clear picture of what the new change really means for them and their organization.

The third phase, "freezing," provides the realization that changes do not stick without some efforts to make them part of the common practices of an organization. Sustaining and retaining new ideas requires as much effort as introducing them. Lewin's model still holds today in reminding us that changes require advance preparation and follow-up.

Change Management

While Lewin describes the process of change, he offers little insight into what to do. Rosabeth Moss Kanter, a recognized expert in the field of change management and professor at Harvard Business School, has worked to fill this void for the last three decades. In her book, *Change Masters*, Kanter outlines the seven skills of "change masters" to provide direction to leaders in how to change.

1. **Tuning into the environment.** To fully understand the need for a change, as well as to implement a well-constructed initiative,

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leaders must encourage everyone in the organization to look for opportunities for change. Leaders also should look outside their organization and connect with the world around them in the process of collecting new information for new approaches.

2. **Kaleidoscope thinking — stimulating breakthrough ideas.** Challenge and question current assumptions. Encourage “out-of-the-box” thinking.
3. **Setting the theme — communicating inspiring visions.** The charisma factor is critical. The statement, “If you can dream it, you can do it,” is not necessarily true. If you can dream it AND make others dream it, you can do it.
4. **Enlisting backers and supporters — getting buy-in and building coalitions.** What is the minimum support system required? Where are you going to get everything you need to be successful? Make sure everything is in place before undertaking an initiative. Plant some seeds before announcing a major plan. See who shows initial support and then bring them in.
5. **Developing the dream — nurturing the working team.** A team that is initiating change needs a leader who can fend off the potential negativity of the rest of the organization to keep the team on track.
6. **Mastering the difficult middle — persisting and persevering.** After the project has gained some momentum and is underway, the completion of the initiative is the most difficult phase. Time and resource shortages often come up unexpectedly and can be difficult to deal with. Everything can look terrible in the middle. Momentum slows because morale sags. Critics seem to (re)surface at this phase. Leaders must be resolved to see it through.

Chapter 2 Understanding the Dynamics of Change

Kanter, R.M.
Change Masters

7. **Celebrating accomplishments — making everyone a hero.** Once the project is complete, take time to celebrate the accomplishment with team members who made it happen. Organizational change is a perpetual process, so after celebration begin tuning into the environment again to see what next steps are needed and begin right away.

Kanter does not suggest that these steps should be done in consecutive order. Innovation needs to be treated like improvisational theater: the actors start the play while the producer is still finding backers, and the team celebrates milestones while the ending is still undetermined.

Kanter recently introduced the Change Wheel, a framework that enables leaders to reflect on the important elements of a “change-friendly” culture. Each spoke of the Change Wheel contains an element that, when combined with the others, gets systemic change rolling. A wheel is the right image, especially when seeking radical change. After all, the turn of a wheel is a revolution. The circular shape means that no one element automatically comes first; there can be many starting points. But all elements must reinforce the change or the wheel will stop turning.

“The voyage of discovery lies not in seeking new horizons, but in seeing with new eyes.”
— Marcel Proust



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Change Wheel Spokes

- **Common themes, shared vision.** Everyone in the unit or organization knows and shares the same aspirations for this change project.
- **Symbols and signals.** The unit or organization is full of signs and activities describing and supporting this change.
- **Management structure and process.** The project is well designed and systematically managed.
- **Education, training, and action vehicles.** Everyone has an opportunity to learn relevant new skills.
- **Champions and sponsors.** The change process involves enough champions and executive sponsors.
- **Quick wins and local innovations.** The unit or organization routinely shares local innovations and useful practices with other units.
- **Communicating useful approaches.** People know what's happening in this project and successes are regularly shared; there's plenty of information available.
- **Policies, procedures, and system alignment.** Policies and procedures are well designed to support this change process.
- **Measures, milestones, and feedback.** There are clear measures and milestones.
- **Rewards and recognition.** People have many opportunities to be recognized and rewarded for their contributions.



“Change is the only constant.”
— Heraclitus, Greek philosopher

Adapted from R.M. Kanter's Change Wheel model.

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Kanter, R.M. *Evolve! Succeeding in the Digital Culture of Tomorrow*

www.reinventingeducation.org

In her latest book *Evolve!: Succeeding in the Digital Culture of Tomorrow*, Kanter reflects on the significance of technological change today and how that impacts organizations. Kanter's work is a part of the IBM-sponsored online resource, Reinventing Education Change Toolkit. The Web site was created through a collaboration among several education partners and funded by businesses to assist school leaders with organizational change.

Implementing Change

Kotter, J. *Leading Change*

Kotter, J. *Our Iceberg Is Melting*

John Kotter, another Harvard Business School professor who is widely regarded as an authority on leadership and change, has been the premier voice on how the best organizations actually "do" change. His bestselling book, *Leading Change*, which outlines an eight-step process for implementing successful transformations, has become the bible on change for managers around the world. His newest book published in 2006, *Our Iceberg Is Melting*, which puts the eight-step process within an allegory, is an entertaining and easy-to-read book that helps people transform their organizations.

According to Kotter's model, everything starts with creating a sense of urgency. He stresses the importance of forming teams and becoming involved in the process early. Communication and a sense of empowerment are essential in making change work. People need to feel close to a change and feel that they as individuals have some control and choice. The final steps relate to persistence in order to sustain the change. In the following table, Kotter's eight-step process is divided into four parts.

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Kotter's Eight-Step Process

SET THE STAGE

1. **Create a sense of urgency.** Help others see the need for change and the importance of acting immediately.
2. **Pull together the guiding team.** Make sure there is a powerful group guiding the change — one with leadership skills, bias for action, credibility, communications ability, authority, and analytical skills.

DECIDE WHAT TO DO

3. **Develop the vision and strategy.** Clarify how the future will be different from the past, and how that future will be made into a reality.

MAKE IT HAPPEN

4. **Communicate for understanding and buy-in.** Make sure that as many people as possible understand and accept the vision and the strategy.
5. **Empower others to act.** Remove as many barriers as possible so that those who want to make the vision a reality can do so.
6. **Produce short-term wins.** Create some visible, unambiguous successes as soon as possible.
7. **Don't let up.** Press harder and faster after the first successes. Be relentless with instituting change after change until the vision becomes a reality.

MAKE IT STICK

8. **Create a new culture.** Hold on to the new ways of behaving and make sure they succeed until they become a part of the culture.



“It is not because things are difficult that we do not dare, it is because we do not dare that things are difficult.”
— Seneca

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Combining the Elements of Change

Biech, E.
Thriving Through Change

Thriving Through Change, a book written by Ellen Biech, is an excellent resource for leaders who are new to various change theories. The book, published by the American Society of Training and Development, provides a clear and insightful summary of the best change practices in business and industry. These practices also are important lessons for education leaders.

Biech has created a model called CHANGE, which combines many of the elements of other theories on change covered in the last several pages. The acronym stands for:

Challenge the current state.
Harmonize and align leadership.
Activate commitment.
Nurture and formalize a design.
Guide implementation.
Evaluate and institutionalize the change.

Biech also describes the characteristics leaders need to implement change. The characteristics make up another neatly designed acronym, VIEW, which stands for:

Visionary
Inspiring
Enthusiastic
Wise

Aligning the Four Change Models

The following table shows how the four models of change can be aligned to show their similarities.

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Aligning the Four Change Models			
Kurt Lewin	Rosabeth Moss Kanter	John Kotter	Ellen Biech
1. Unfreeze	1. Tuning in to the environment. 2. Kaleidoscope thinking: stimulating breakthrough ideas.	1. Create a sense of urgency.	Challenge the current state of affairs.
		2. Pull together the guiding team. 3. Develop the change vision and strategy.	Harmonize and align leadership.
2. Changing (transformation)	3. Setting the theme: communicating inspiring visions.	4. Communicate for understanding and buy-in.	Activate commitment.
	4. Enlisting backers and supporters: getting buy-in, and building coalitions. 5. Developing the dream: nurturing the working team.	5. Empower others to act.	Nurture and formalize a design.
3. Refreeze	6. Mastering the difficult middles: persisting and persevering.	6. Produce short-term wins.	Guide implementation.
	7. Celebrating accomplishments: making everyone a hero.	7. Don't let up. 8. Create a new culture.	Evaluate and institutionalize the change.

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Emotional Phases of Going Through Change

Conner, D. *Managing at the Speed of Change*

There are two spectra of emotional phases that people go through in the face of organizational change: one is positive and the other is negative.

In his book, *Managing at the Speed of Change*, Daryl Conner, a leading author and consultant on change management, introduced the emotional phases that individuals go through in any organizational restructuring. He was one of the first and strongest voices to address this human aspect of change. There are two spectra of emotional phases that people go through in the face of organizational change: one is positive and the other is negative. An important point to remember is that initial opposition, or what appears to be opposition, is not necessarily fixed; emotions and reactions change over time. Furthermore, leaders can influence these reactions based on their behaviors.

The first spectrum encompasses the five phases that people experience when they are in favor of a change.

1. **Uninformed optimism.** At the beginning of a change project, there is frequently a “honeymoon period.” Hopes and optimism are high among the individuals involved. It appears that all the major obstacles have been identified and planned for. Feelings run high and morale is at a peak.
2. **Informed pessimism.** When the project has been developed a little further, problems increasingly surface. Few solutions are apparent or available. The project may seem unattainable or unrealistic. Morale drops, and people ask themselves why they ever got involved or thought they could accomplish what they set out to do in the first place.
3. **Hopeful realism.** In this phase, pessimism declines. Participants begin to feel a sense of realistic hopefulness based on solid reality testing and develop a new confidence in their capability to handle whatever new problems may surface.

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4. **Informed optimism.** Optimism continues to develop based on the growing confidence in oneself and the project. Typically, there is a fresh burst of energy linked to overcoming problems and uncertainty, as well as sensing that completion is near.
5. **Rewarding completion.** Once a successful change has been made and the experience has been processed, participants experience a sense of satisfaction.

People who have negative reactions to a change go through a different cycle of emotional phases. The emotional phases experienced here are similar to those of death and personal loss.

1. **Immobilization.** The initial reaction to the announcement of the change is shock. The change is so alien to the individuals' frame of reference that they often are unable to relate to what is happening.
2. **Denial.** Individuals are unable to assimilate new information about the change into their frame of reference. Information related to the change often is rejected or ignored. The common reactions are: "It won't last," "It won't affect me," or "If I ignore it, it will go away."
3. **Anger.** Frustration and hurt are exhibited. These emotions may be directed toward friends, family, and colleagues who are blamed and criticized.
4. **Bargaining.** To avoid the negative impact of the change, individuals begin to negotiate. Bargaining can take many forms including extension of deadlines, reassignments, exceptions, etc. This phase is the beginning of acceptance because there is recognition that the change cannot be avoided.



"Everyone thinks of changing the world, but no one thinks of changing himself."
— Leo Tolstoy

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5. **Depression.** In this phase, there are feelings of resignation and being victimized. There is a lack of emotional and physical energy in day-to-day work. Although unpleasant, depression represents a step in the acceptance process, as the full impact of the change finally is being acknowledged.
6. **Testing.** Participants begin to regain a sense of control by freeing themselves of feelings of depression and victimization. The new limitations posed by the changes are acknowledged and ways are explored to redefine goals that will make it possible for them to succeed within the new framework.
7. **Acceptance.** The change is responded to realistically. While the participants still may not fully like the change, they are more grounded and productive within the new context.

The best advice concerning emotional reaction to change, according to Conner, is to recognize the power of this type of negative reaction, but also to know that these emotions will change over time as people progress through the process of change.

Conner, D. *Leading at the Edge of Chaos: How to Create the Nimble Organization*

In his more recent book, *Leading at the Edge of Chaos: How to Create the Nimble Organization*, Conner is upbeat in urging leaders to anticipate change and learn to thrive in a climate of rapid change and uncertainty. This really applies to the world of education today.

Why Is There Resistance to Change?

Conner's research also gives insight into potential areas of resistance to change. To look into the most common reasons for this resistance, he used data from 457 managers and executives who represented a wide range of organizations facing various types of major change (re-engineering, downsizing, new technology, etc.). Based on this data, here are the top six reasons why individuals resist change:

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1. **Current level of stress.** When people are already busy and under stress, the additional pressure of a change may become too much for them to assimilate.
2. **Inadequate rewards for accomplishing change.** For people to be motivated to change, a reward must be provided in the form of something they truly value.
3. **Lack of involvement in the planning process.** It is human nature for people to support what they have helped create. If people do not believe they have had a significant degree of input into the planning of a change, resistance usually increases.
4. **High tangible, intellectual, or emotional costs of change.** People resist changes that appear to be too costly relative to what they will gain.
5. **Lack of consideration for daily work patterns.** Failing to acknowledge the impact a change may have on people's work patterns tends to promote distrust and alienation.
6. **Unclear communication during the process of change.** Even if a change affects only one other person, communication can be easily distorted.

For the past two decades, scientists have gained new and a far more accurate view of human nature and behavior. New imaging technologies such as functional magnetic resonance imaging (fMRI) and positron emission tomography (PET), along with brain wave analysis technologies such as quantitative electroencephalography (QEEG), have enabled neuroscientists to observe the human brain at work as people function. This knowledge has given educators

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Rock, D. and
Schwartz, J. "The
Neuroscience of
Leadership"

greater understanding of the learning process. It also has provided revelations into organizational change.

Researchers David Rock and Jeffrey Schwartz, for instance, have used brain research to give some interesting insight into organizational change that they have summarized in the following points:

Change is pain. Organizational change is unexpectedly difficult because it provokes sensations of physiological discomfort.

Behaviorism doesn't work. Change efforts based on incentive and threat (the carrot and the stick) rarely succeed in the long run.

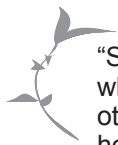
Humanism is overrated. In practice, the conventional empathic approach of connection and persuasion doesn't sufficiently engage people.

Focus is power. The act of paying attention creates chemical and physical changes in the brain.

Expectation shapes reality. People's preconceptions have a significant impact on what they perceive.

Attention density shapes identity. Repeated, purposeful, and focused attention can lead to long-lasting personal evolution.

The notion of expectation shaping reality speaks to the importance of vision and a framework for change. If staff members have an unclear or different vision about what the organization's leaders believe, they will not respond appropriately to change. Leaders must communicate a clear vision and ensure that staff are working from a similar mental model. An example of a mental model that would shape changes in a school is, "All children can learn." If the school



"Some people change
when they see the light,
others when they feel the
heat."

— Caroline Schroeder,
author and scholar of
early Christianity

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leader believes this mental model but the staff believe that “most good students can learn,” then they will make different decisions and changes will be inconsistent and short lived.

No discussion about the process of change would be complete without mentioning Peter Senge’s book, *The Fifth Discipline*, which outlines five disciplines for long-term success:

- **Systems thinking** is developing an awareness of the complexity and interdependence of connected processes.
- **Personal mastery** means developing individual aspiration for success and clear measures of competence.
- **Mental models** refer to becoming more aware of the sources of our thinking based on beliefs and values.
- **Building a shared vision** is a commitment to a common purpose.
- **Team learning** means improving skills as a group and learning from each other. Team learning is the essence of effective change. When asked about what it is like being part of a great team, people talk about being part of something larger than themselves that allows them to be connected and creative.

A great virtue of Senge’s work is the way in which he puts systems theory to work. *The Fifth Discipline* provides a good introduction to the basics of systems theory and the way in which it can be brought together to make sense of organizational questions and issues. A key problem with much that is written about and done in the name of management, Senge argues, is that simplistic frameworks are applied to what really are complex systems. This applies to schools

Five Disciplines for Long-Term Success

A key problem with much that is written about and done in the name of management is that simplistic frameworks are applied to what really are complex systems.

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Senge, P. *The Fifth Discipline*

as well as businesses. We tend to focus on the parts rather than seeing the whole and fail to see organization as a dynamic process. In fully appreciating how organizations work as a full system, our schools must become “learning organizations.”

According to Senge, learning organizations are institutions “where people continually expand their capacity to create the results they truly desire, where new and expansive patterns of thinking are nurtured, where collective aspiration is set free, and where people are continually learning to see the whole together.”

The basic rationale for learning organizations is that in situations of rapid change only organizations that are flexible, adaptive, and productive will excel. While all people have the capacity to learn, the structures in which they have to function are often not conducive to reflection and engagement.

Senge and a team of educators and organizational change leaders, created an addition to *The Fifth Discipline* titled, *Schools That Learn: A Fifth Discipline Fieldbook for Educators, Parents and Everyone Who Cares About Education*. This book offers practical advice for educators, administrators, and parents on how to strengthen and rebuild schools.

Building Trust

Trust is an essential ingredient in organizational change. Think of trust as a lubricant. With a liberal amount of trust, even the biggest of changes glide easily toward implementation. Without trust, friction dominates. Every little movement is a struggle and progress is slow. Leaders may need to examine their level of trust in the organization before attempting change.

The importance of trust can be exemplified in the following experience. The International Center had discovered a high school

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that created a unique master schedule. It was a rotating modular schedule in which classes only met three days out of four. The schedule allowed students to take more advanced courses and electives and, at the same time, teachers were able to double their planning time. The International Center showcased this school at several state meetings, and the school hosted many study tours from neighboring schools.

Teachers from one visiting team, in particular, emphasized their amazement at how students were able to schedule all the courses they wanted, taking both advanced math, science, and career and technical courses, while teachers had much more planning time. The visiting teachers said to the host school that there has to be some “catch” because this schedule seems too good to be true. But, no, the host school said. What you see is how it is. The host then added that there is one caution. This schedule does increase planning time and the breadth of student learning, but the school board also could choose to reduce the size of the faculty by one-third. The visiting teachers’ expressions wilted as they turned to each other and said that the schedule would not work for them after all. What happened here? The visiting team did not trust its board of education, so it was better to keep the status quo. A change can be a positive improvement, but unless there is a high level of trust, a potential change likely will dissolve even before it is thoroughly thought through.

Steven Covey, a noted author and lecturer on personal skill development and management, points out that trust begins with a call to reflect on self-trust.

To build trust among others, you must first trust yourself. He describes this self-trust as credibility. Increasing one’s credibility means a renewed focus on integrity, intent, capabilities, and results. Integrity is more than being honest; it is “walking the talk” and acting

Unless there is a high level of trust, a potential change likely will dissolve even before it is thoroughly thought through.



“We must become the change we want to see in the world.”
— Ghandi

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in a manner that is consistent with the delivered message. Self-trust also is about building competence and getting results.

Covey, Stephen.
*The Speed of Trust:
The One Thing That
Changes Everything*

Covey has identified 13 behaviors of highly trusted leaders:

- Talk straight
- Demonstrate respect
- Create transparency
- Right wrongs
- Show loyalty
- Deliver results
- Get better
- Confront reality
- Clarify expectations
- Practice accountability
- Listen first
- Keep commitments
- Extend trust

Involving Resistors

When attempting to make changes, there is a natural tendency to recruit the most optimistic and positive people and avoid the resistors. While the positive group is essential to getting the work done, avoiding the resistors can be dangerous. Jeffrey Russell and Linda Russell in their book *Change Basics* provide some sound advice on involving resistors.

Russell, J. and
Russell L. *Change
Basics*

Objections and questions raised early on in a process can be helpful in refining and improving a change. Leaders should welcome critiques and criticism. A proposed change that has no opposition should raise a red flag. Perhaps the change is not worthy of consideration if no one voices any objection. Also resistors, once convinced, can become the strongest advocates for change.

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Why Change Leaders Value Resisters

- ✓ They help define and clarify fundamental problems that must be addressed by the change.
- ✓ They might identify other problems that need to be solved first.
- ✓ They force change leaders to think through the change before it is implemented.
- ✓ Their tough questions can improve the vision, strategy, and plan.
- ✓ They let us know who opposes the changes and therefore whom change leaders need to listen to.
- ✓ They (appropriately) slow down the change.
- ✓ They may be right; the change is a dumb idea!

Russell and Russell

Political competence may be an anathema to school leaders, but politics is recognizing what can and cannot be controlled and when to take action, as well as anticipating who is going to resist the agenda for change. Political competence is a critical skill needed by all leaders involved in the process of change.

The Politics of Change

What's Your Agenda?

For leaders to understand who is likely to support or resist a change, they have to find out the goals and approaches of others. How one approaches change usually can be categorized into four types of agenda. Determining what type of agenda colleagues and other members of the organization tend to pursue allows leaders to better identify how to bring staff on board and how to identify the ones

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Bacharach, S. *Get Them on Your Side*

who less likely to be supportive. The four types of agenda are as follows.

1. **Traditionalist agenda** combines the goals of tinkering with a planning approach. Individuals with this agenda, while not against new ideas *per se*, are leery of them. The rhetoric of this agenda is that change should be regenerative — that its purpose is to integrate the past successes of the organization into its current reality. Leaders who use the traditionalist agenda treat the current problem in the organization as a breakdown of tradition.
2. **Adjuster agenda** combines the goals of tinkering with an improvising approach. Individuals with this agenda assume that change is natural, inevitable, and unpredictable, and should react when necessary. Unlike the traditionalist, who draws inspiration from the past, the adjuster is very much in the present and is responsive to external circumstances. The rhetoric is one of ebb and flow and rolling with the punches.
3. **Developer agenda** combines the goals of overhauling with a planning approach. People with this agenda believe in a scientific or systematic method and are committed to staying on top of the game — empirically, rationally, and incrementally. They want to formalize, codify, and quantify the change process. The rhetoric is one of operational proficiency.
4. **Revolutionary agenda** combines the goals of overhauling with an improvising approach. People with this agenda don't seek to implement a few novel ideas, but instead aim to impose a completely new set of ideas that will fundamentally transform the mission and the processes of the organization. They believe that overthrowing the current way of doing business is crucial to the health of the organization.

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The Multiple Roles of Leaders

School leaders must wear multiple hats in facilitating change, depending on the circumstances. Education consultant R. Bruce Williams outlines four primary roles a leader must undertake when pursuing change:

Williams, R. B.
*Twelve Roles of
Facilitators for
School Change*

1. **Process leader** serves primarily behind the scenes as an architect or designer in setting up the process. This role emphasizes planning, relationship building, and thinking through the process.
2. **Skills trainer** is a much more visible role in which leaders take a more active position in providing direction. This level of leadership can be compared to a sports team quarterback or coach in which the leader models expectations or provides information critical to the process of change.
3. **Resource consultant** is often a problem solver or the director of events who works to obtain resources, sets deadlines, decides on expectations, and generally makes sure that process is running smoothly.
4. **Group energizer** can be compared to the roles of a symphony conductor or concert master in which the leader attempts to stimulate passion in the change process, encourage full participation, and provide constructive criticism for improvement.



"It is amazing what
you can accomplish,
if you don't care who
gets the credit."
— Harry Truman

Six Sources of Influence

So, how can leaders say the right thing to the right person at the right time during challenging situations in the quest for change? In the

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K. Patterson, et al.
*Influencer: The Power
to Change Anything*

book, *Influencer: The Power to Change Anything*, Kerry Patterson proposes six sources of influence:

1. **Personal motivation.** Individuals need to perceive vital behaviors as pleasurable or valuable. This can be done by creating new motives and trying new behaviors.
2. **Personal ability.** The skills and ability to engage in vital behaviors are critical. Deliberate practice and training can be used to enhance these attributes.
3. **Social motivation.** Social networks have an immense influence on personal decisions, and great influencers appreciate this by enlisting the support of the right individuals.
4. **Social ability.** By using the resources in personal relationships, individuals and groups can produce results synergistically.
5. **Structural motivation.** Incentives and punishment can effectively motivate change; however, they must be used with caution and should never be used in isolation.
6. **Structural ability.** To harness the power of “things” in the environment, individuals need to become aware of them and determine how changing them changes behavior.

Developing Resilience

It is important for leaders to reflect on the resilience of staff during organizational change. Resilience is the process of actively and creatively developing personal “survival” capacities, that is, learning to repair oneself from outside influences and being strengthened by facing the adversities of life.

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Protective mechanisms, such as self-talk and surrounding oneself with support of friends, as well as the beliefs and behaviors developed from life experiences, determine people's levels of resilience. Individual resilience is composed of self-assurance, personal vision, flexibility, organizational skills, problem-solving ability, interpersonal skills, social connections, and being proactive. Following is a list of actions that leaders can take to help strengthen resilience in others.

Russell, J. and
Russell, L.
Change Basics

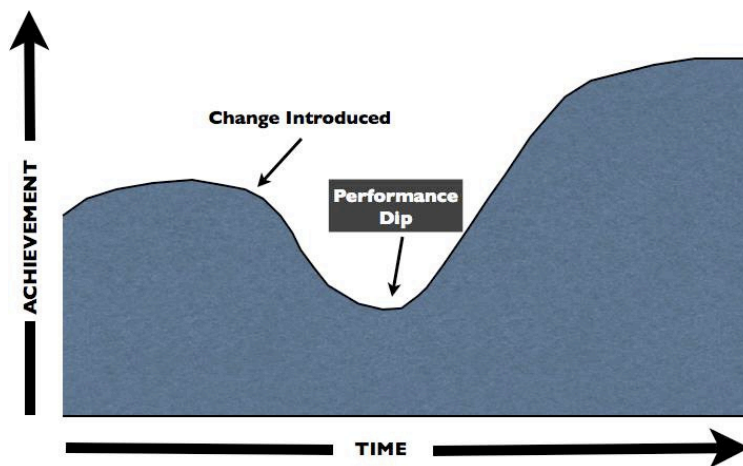
Leader Actions to Strengthen Resilience in Others

- Remind people what isn't changing.
- Increase opportunities for social connections.
- Increase communication about the coming changes and challenges.
- Work hard to shift grouching and whining toward problem solving.
- Listen to people's anxieties and fears.
- Acknowledge their losses.
- Engage staff in developing a shared vision of a realistically optimistic future.
- Encourage a healthy work-life balance.
- Hold brown-bag seminars.
- Promote the employee assistance program.
- Explain the "whys" of the change and associated challenges.
- Celebrate the little victories along the way.
- Keep the team together.
- Break problems or challenges into bite-sized pieces.
- Model good practices and behaviors.

Chapter 2 Understanding the Dynamics of Change

Performance Dip

At the beginning of a new change or growth curve, an organization almost always experiences a “dip,” or an apparent setback. During this time, there is a temporary, but real and sometimes alarming, drop in resources, energy, effectiveness, and productivity on the part of teams and individuals. Life provides many lessons of the natural phenomenon of a performance dip. Newborns, for example, typically lose weight during their first week of life. This can be alarming for new parents unless they have been told to expect this normal dip in weight. Likewise, as organizations encounter changes or embark on new initiatives, staff and leaders need to recognize this temporary dip when they are in the beginning phases of growth and improvement.



Every new growth curve in each new effort, and even each small changes in the goals or makeup of a group, triggers another beginning with the characteristic dip and accompanying anxiety. On the positive side, this performance dip is like flexing one's knees

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before jumping over a physical obstacle. By temporarily squatting (dipping), one can jump much higher and farther than with straight knees.

For schools, change is more about “reculturing,” according to Michael Fullan, Professor Emeritus of the Ontario Institute for Studies in Education at the University of Toronto and author of *Leading in a Culture of Change*. Fullan, who explains the complexity of the change process in schools, emphasizes that moving to a new level is not a linear process in which a simple checklist can be used to check off consecutive steps. Change is a slow and steady process rather than a quick and expedient one.

Fullan also reminds us that effective change is not about looking at schools that have integrated the most changes or how frequently changes are made. Real change can be measured in its impact on student learning. Fullan was one of first to emphasize to a public audience that change is about building relationships. The leader’s role is to create, maintain, and improve these relationships in the school community, and this has a direct impact on organizational change.

Change also should be about building and sharing knowledge. One of his criticisms is that educators do too little sharing and modeling of practices for others, particularly within the school. An effective change process creates the conditions under which teachers are constantly building their personal and collective knowledge about good practices.

Tony Wagner and Robert Kegan in their book *Change Leadership: A Practical Guide to Transforming Our Schools* also emphasize that school change is not to a series of rigid practices but a change to school culture. The book also introduces a concept known as

Insight on Change from Leading Educators

Fullan, M. *Leading in a Culture of Change*

Wagner, T and R. Kegan. *Change Leadership: A Practical Guide to Transforming Our Schools*

Chapter 2 Understanding the Dynamics of Change

See Chapter 3 for more detail on the characteristics of schools as a biological system.

the “ecology of change.” Schools are individual systems, each with unique characteristics. The universal elements involved in these systems include relationships, connections to the community, and environmental influences.

The Four Cs — Context, Culture, Conditions, and Competencies

Wagner and Kegan summarize what they refer to as the “four Cs”: context, culture, conditions, and competency.

1. **Context** means understanding the global, state, and community realities of what students will need to know to succeed.
2. **Culture** examines the day-to-day practices of staff in classrooms and schools.
3. **Condition** of learning relates to the organization and capacity of the teaching process.
4. **Competency** relates to the skills all of staff and leaders in a school system.

The convergence of these four Cs leads to improvement in student learning.

Four Themes to Apply to Schools

There are four themes that emerge from all the literature and research reviewed so far: change initiators, change process, change principles, and change strategies.

Change initiators are the trigger — events or information that start the whole process toward change. Usually this trigger encompasses more than a single event or piece of information.



“Progress is impossible without change and those who cannot change their minds, cannot change anything.”
— George Bernard Shaw, Irish playwright

Leading Change in High Schools

Change process is a cycle of distinct initiatives with several components that occurs as changes evolve. During this time, progress is measured and adjustments are made.

Change principles are the core beliefs of an organization. The principles drive change by guiding the decisions of professional teams reflecting what they believe about teaching and learning.

Change strategies are the concrete actions that leaders take to effect change.

From these four themes, the International Center has developed a change model that is described in detail in the next chapter.

For actions that leaders can take to effect change, see Components of School Excellence in Chapter 5.

Bacharach, S.B. *Get Them on Your Side: Win Support, Convert Skeptics, Get Results*. Cincinnati, OH: Adams Media, 2005

Biech, E. *Thriving Through Change: A Leader's Guide to Change Mastery*. Alexandria, VA: ASCD Press, 2007

Blanchard, K. *Whale Done!* New York, NY: Simon and Schuster, 2002

Cambron-McCabe, et al. *The Superintendent's Fieldbook*. Thousand Oaks, CA: Corwin Press, 2004

Conner, D. R. *Managing At the Speed of Change*. New York: Random House, 1992

Conner, D. R. *Leading at the Edge of Chaos: How to Create the Nimble Organization*. New York: John Wiley and Son, 1998

Covey, S. *The Speed of Trust: The One Thing That Changes Everything*. New York: Free Press, 2006

Deal, L. B. et al. *Leading With Soul: An Uncommon Journey of Spirit*. San Francisco, CA: Jossey-Bass, 1995

References

Chapter 2 Understanding the Dynamics of Change

Fullan, M. *Leading in a Culture of Change*. San Francisco, CA: Jossey Bass, 2001

Gardner, H. *Changing Minds: The Art and Science of Changing Our Own and Other People's Minds*. Cambridge, MA: Harvard Business School Press, 2004

Hoerr, T. R. *The Art of School Leadership*. Alexandria, VA: ASCD, 2005

Hord, S. M. *Learning Together, Leading Together: Changing Schools Through Professional Learning Communities*. New York: Teachers College Press, 2004

Jennings, M. *Leading Effective Meetings, Teams, and Work Groups in Districts and Schools*. Alexandria, VA: ASCD, 2007

Kanter, R. M. *The Change Masters*. New York: Simon & Shuster, 1983

Kanter, R. M. *Evolve!: Succeeding in the Digital Culture of Tomorrow*. Cambridge, MA: Harvard Business Press, 2001

Kotter, J. P. *The Heart of Change*. Cambridge, MA: Harvard Business Press, 2002

Kotter, J. P. *Leading Change*. Cambridge, MA: Harvard Business School Press, 1996

Kotter, J. P. *Our Iceberg Is Melting: Changing and Succeeding Under Any Conditions*. New York: St. Martin's Press, 2005

Lewin, K. "Frontiers in Group Dynamics." *Human Relations*, 1951

Marzano, R. J., T. Waters, et al. *School Leadership That Works: From Research to Results*, Mid-continent Research for Education and Learning (McREL), 2005

Leading Change in High Schools

Patterson, J. L. and P. Kelleher. *Resilient School Leaders: Strategies for Turning Adversity Into Achievement*. Alexandria, VA: ASCD, 2005

Patterson, K. et al. *Influencer: The Power to Change Anything*. New York: McGraw-Hill, 2008

Reeves, D. B. *The Learning Leader: How to Focus School Improvement for Better Results*. Alexandria, VA: ASCD, 2006

Rock, D. and J. Schwartz. "The Neuroscience of Leadership." *Strategy+Business*, 2006
www.strategy-business.com/press/freearticle/06207

Russell, J. and L. Russell. *Change Basics*. Alexandria, VA: ASCD, 2006

Senge, P. *The Fifth Discipline: The Art and Practice of the Learning Organization*. New York: Doubleday, 1994

Senge, P. *Schools That Learn: A Fifth Discipline Fieldbook for Educators, Parents and Everyone Who Cares About Education*. New York: Doubleday, 2000

Sergiovanni, T. *Strengthening the Heartbeat: Leading and Learning Together*. San Francisco, CA: Jossey-Bass, 2004

Wagner, T. and R. Kegan. *Change Leadership: A Practical Guide to Transforming Our Schools*. San Francisco, CA: Jossey-Bass, 2006

Wheatley, M. *Turning to One Another*. San Francisco, CA: Berrett-Koehler Publishers, 2002

Williams, R. B. *Twelve Roles of Facilitators for School Change 2nd Edition*. Thousand Oaks, CA: Corwin Press, 2008

Chapter 3



Why Change and How to Do It

The process of improving student performance goes by many different names. It has been referred to as school improvement, school reform, school reinvention, and school restructuring. No matter what it's called, it comes down to the single goal of raising student achievement through change. In working with schools across the county that are making concerted efforts to improve, the International Center has focused on the following characteristics:

- Change must be revolutionary in spirit and evolutionary in time frame.
- Each school community has its own "DNA"; what works in one does not necessarily translate to another.
- Schools are unique systems that tend to maintain the status quo and often produce unintended consequences in response to change.
- Schools as systems produce the results they are design to produce. If different results are desired, the focus must be on changing the system, not simply demanding the system work better.
- School change can occur when guided by leadership, driven by data, and supported through continuous professional learning.

A Model for Leadership and Change

The continuation of pubic education as we know it today is not guaranteed. The actions of school leaders will determine the fate of schools in the 21st century. One thing we know for sure is that status quo is not an option. Everyone is seeking change in schools. While all educators must play key roles in changing our schools, the

Leading Change in High Schools

burden is even greater for those in leadership positions. Leaders must respond to change appropriately and show others the way. They must take school staff on challenging journeys that the staff would not take on their own.

Creating real change in schools is dynamic. There is no recipe with a list of ingredients and simple steps, no detailed blueprint for schools to follow for success. However, there are lessons that can be learned from other schools. The International Center has worked with schools across the country to identify models, share best practices, conduct research, and support school leaders in facilitating changes that lead to improvement. This work has revealed that schools usually need to address four interconnected questions in order to achieve high academic standards for all students — **why, what, where, and how**. While these questions are interconnected, there is a sequence to addressing these questions. All schools must start with the *why* question. Next, the *what* question builds a common focus on what to change. Third, schools must set a direction with the *where* question. Finally, the *how* question deals with the implementation of change. To further elaborate:

- **Why** involves convincing educators, parents, and community members as to why a school needs to change.
- **What** is the content of change, built through a common focus. It involves using good data, research, and best practices to determine what needs to change once people understand why.
- **Where** defines the location and direction, which involves assessing the present status, agreeing on a common direction, and defining ways to measure improvement in student achievement.
- **How** is the process of change and involves determining how to change the school once people understand and embrace the why, what, and where.

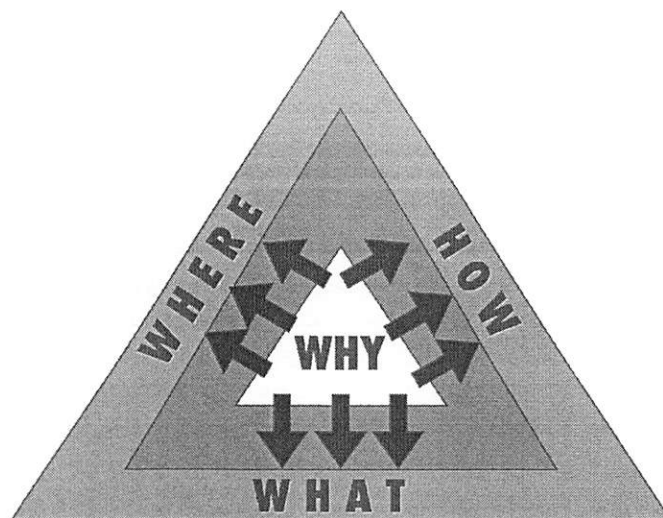
Creating real change in schools is dynamic. There is no recipe with a list of ingredients and simple steps, no detailed blueprint for schools to follow for success. However, there are lessons that can be learned from other schools.

Chapter 3 Why Change and How to Do It

The solution is worthless for a problem that has not been acknowledged.

Regrettably, many schools begin their improvement efforts in the reverse order by first deciding how to do things differently. That is, they find a “solution” without clearly articulating the need or problem. Yet, if staff and stakeholders do not believe their school must change or understand what needs to change, the suggestion for how to change is likely to be ineffective or rejected. The solution is worthless for a problem that has not been acknowledged.

The following figure represents the International Center’s model of change. Change is driven by understanding the *why* of the need for change. Putting *why* in the center of the diagram illustrates its importance and the fact that it drives the change. *What*, *where*, and *how* become the three activators of change in schools. *What* defines the content and focus of the change. *Where* implies destination and where the school is headed and focuses on ways the school will evaluate its success in making changes. *How* describes the process of implementing the change. All three of these activators must be addressed for schools to accomplish successful change.



Change Model

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The nature of change is that it must be unique to local needs, forged through consensus, and built upon the unique strengths of each school. There is no one single solution to improving our schools. A combination of strategies is necessary to achieve a new vision of learning. The goal is not to make every school the same, but to enable each school to construct its own solutions.

The skills individuals need for success in the 21st century are vastly different from those needed in the past. Our education system must evolve in order to prepare students for the changing world in which they will live and work. American society is undergoing fundamental structural changes at the family, workplace, and community levels.

School reform begins with a desire by some — and at least a willingness of others — to be led. The administrators and staff in the most successful schools embrace change as exciting and challenging rather than intimidating and threatening. These educators seem to understand that schools today need to be updated in order to keep pace with a changing society and economy.

This nation's fixation on preparing young people for college, while a worthy goal, can become an impediment to achieving world-class education standards. Parents and others must recognize that, while we must continue to prepare our young people to be good citizens and ready them for higher education, we must also add a third important purpose to education — learning to apply academic skills needed for the increasingly sophisticated workplace.

School districts that have been successful in creating a culture or environment to support change have used a variety of techniques: print, radio, and television media; special events and presentations; community partnerships; and parent and student focus forums. While Americans as a group seem convinced that this country's schools must change, most parents and taxpayers think that their

Why Change Schools?

Our education system must evolve in order to prepare students for the changing world in which they will live and work.

schools are just fine. High-performing schools, on the other hand, clearly understand the realities of a changing society and, rather than feel threatened by these changes, seem to embrace the need to evolve.

The International Center has assisted many school leaders in creating community and staff awareness of the need for change through research, presentations, print materials, white papers, newsletters, and videos. These efforts address four major trends that must be acknowledged to ensure that our nation and our students are prepared to meet the challenges of the near and distant future:

- technology
- globalization
- demographics
- new student generations

Technology

Reviewing the major technological inventions and breakthroughs that have occurred within the last 15 years, one wonders whether the pace could be maintained for the next 15. If anything, the rate of innovation is likely to accelerate over time. In 1991, few of us could have imagined – other than those in research and development – the impact that the Internet, e-mail, and cell phones would have on the way people conduct their everyday personal and professional activities. Can we truly fathom the societal impacts that wireless sensor networks, grid computing, DNA computers, nanotechnology, molecular imaging, mechatronics and biomechatronics, language translation software, and other emerging technologies will have on the global economy in the next 15 years?

When it comes to technology, it is easy for older generations to be awed by younger people's savvy. Technology changes so dramatically in such a short period of time that those who do not use it regularly risk being "behind the times." For many who did

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not grow up using computers and other “smart” technologies, the introduction of these products was initially met with skepticism. Now, most people can scarcely imagine life without them. Of course, most would agree that once we become acclimated to technology, further advances are not quite as daunting because some skills already are in place. Still, today’s students, who have grown up in the modern age of information technology, have a great advantage because their learning curve is less steep than that of older generations.

In the United States, students appear to be learning the majority of technology skills in extracurricular settings rather than through formal schooling. Moreover, the skills they need to compete in the Information Age – relevant 21st century skills such as critical thinking, problem solving, and effective communication – are acquired outside of the classroom. Through technology, millions of students from developing countries now have the ability to develop this set of skills, essentially leveling the proverbial global playing field.

In the 21st century, science and engineering will become the cornerstones of what one must know and be able to do.

In the 21st century, science and engineering will become the cornerstones of what one must know and be able to do, but the United States is being outpaced dramatically by India, China, and Eastern European nations. The decline of American enrollment in science and engineering fields, concurrent with the increasing demand for professionals in these fields, places the United States at a great disadvantage in the global marketplace. Continuation of these trends could result in severe human and economic consequences for this nation. Following are some emerging technologies that will help shape our future world.

Low-Cost Computing

One Laptop Per Child (OLPC), an initiative started by Massachusetts Institute of Technology (MIT) professor Nicholas Negroponte in

Chapter 3 Why Change and How to Do It

2005, was set up to oversee the development of a \$100 PC for educating children around the world. OLPC laptops are geared to the educational ministries of governments that can purchase a minimum of 250,000 units. The computer, now known as XO, has become a reality and is being produced in mass quantities. The final price is somewhat higher than the target \$100, but this device is a remarkable example of how far we have progressed in creating low-cost computing. This XO is a rugged wireless networked computer with a color screen and operates off a battery and can be recharged by the sun or a pull string when electricity is not available.

Perhaps the most intriguing aspect is the operating system called Sugar. It is organized around children and how they learn rather than the “office” metaphor of other operating systems that incorporate phrases such as desktop, files and folders. The XO computer uses terms such as friends, activities, learn, create, journal. It will be exciting to see how this innovative low-cost computer changes student learning and communication on a global scale.

Wireless Sensor Networks

“Motes,” also known as “smart dust,” are small, low-power wireless sensing and communication platforms. Each mote is about the size of its power source – in some cases a set of AA batteries – and comprises a processor, a small amount of virtual memory, and sensors to monitor environmental variables such as light, humidity, pressure, and temperature. Motes can be linked to form a wireless data collection network because each is equipped with a radio transceiver that is powerful enough to broadcast snippets of data to other nearby motes. Ultimately, the data is transmitted to a server to create a database from the many pieces of information collected.

Motes have the potential to monitor many aspects of our daily lives. They can be embedded in bridges, clothing, and in myriad

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other materials to monitor the environment, machines we use, and people's body functions, to name a few.

Enviromatics

Enviromatics, a term derived from the words "environment" and "informatics," is an emerging technology that uses the real-time data-gathering ability of remote wireless networks, the data-sharing ability of the Web, and greater computing power to make more informed decisions about various environments. Enviromatics relies heavily on three technologies: (1) motes and wireless sensor networks; (2) new Internet formatting standards, such as Extensible Markup Language, which form a Semantic Web; and (3) grid computing. When combined, these technologies offer the capacity to accurately collect large amounts of data, comparatively analyze it, and make short- and long-term predictions based on the analyses.

Enviromatics can be applied to situations ranging from the most effective time for farmers to apply herbicides to crops to minimizing human impacts on environmentally sensitive areas. Researchers at Pennsylvania State University's Center for Environmental Informatics explain how a farmer in Pennsylvania could find environmental data gathered from other wheat-growing states, including the likelihood of the *Fusarium* fungus spreading to his farm. Based on the data, a specialized Web site would provide local maps with risk levels, which would allow the farmer to determine if and when to apply fungicides to stop disease from devastating wheat crops.

One emerging technology that will help bring enviromatics to scale is grid computing, which allows distributed computer resources to be available on demand. Grid computing consists of networks of computers that act in concert to perform very large tasks. This technology has been applied to computationally intensive scientific,

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[www.worldcommunity
grid.org](http://www.worldcommunitygrid.org)

Chapter 3 Why Change and How to Do It

mathematical, and academic problems. It also is used in commercial enterprises for such diverse applications as drug discovery and economic forecasting.

One pound of DNA has the capacity to store more information than all the computers ever built.

DNA Computers

DNA, which contains the genetic instructions for the development and functioning of living organisms, has the potential to perform calculations many times faster and hold billions of times more data than silicon microchips. One pound of DNA has the capacity to store more information than all the computers ever built. More than 10 trillion DNA molecules can fit into a one-cubic-centimeter-sized area. With this small amount of DNA, a computer would be able to hold 10 million megabytes of data and perform 10 trillion calculations at a time. The more DNA is added, the more calculations could be performed. What makes DNA computing so much faster than the traditional silicon microprocessor is its ability – as in grid computing – to do parallel computing, a type of computing process that divides a task among many smaller computers instead of one large one to do the job faster and more efficiently.

Nanotechnology

Nanotechnology uses molecules and atoms to make nanometer-size building blocks to construct new materials. One nanometer is a billionth of a meter. Consider that hundreds of thousands of nanosize particles could fit inside the period at the end of this sentence. By these standards, a human blood cell is mammoth — about 7.5 micrometers in diameter, or 7,500 nanometers. Nanotechnology spans disciplines ranging from biology and medicine to various fields of engineering and computing. The practical applications are far-reaching. A liquid made of nanoscale protein fragments, or

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peptides, has been engineered to stop bleeding almost instantly, for example. Under conditions like those inside the body, the peptides self-assemble into a fibrous mesh, which to the naked eye appears to be a transparent gel. This could be invaluable in operating rooms, at accident sites, or in the battlefield.

MIT researchers have developed novel nanoparticles that could help identify tumors via cancer imaging and then deliver chemotherapy locally. A key feature of these nanoparticles is that they mimic blood platelets, which flow freely in the blood and act only when needed by zoning in on injured blood vessels and accumulating there to form clots. Similarly, these new nanoparticles could lock in on particular features of tumor blood vessels to deliver treatment or choke off the blood supply to a tumor. In addition, by slipping through tiny gaps in fast-growing tumor blood vessels and then sticking together, the particles could create masses with enough of a magnetic signal to be detectable by magnetic resonance imaging (MRI).

Researchers at the University of California, Riverside, are developing nanodevices that can “listen” to the subtle cues that cancerous cells emit. The research is based in part on microelectrical arrays, thin metal plates about the size of a human hair in diameter, which are used to sense the electrical activity from different types of cells. The technique allows scientists to differentiate cells from various parts of the body as well as cancerous cells from healthy ones.

As part of the National Cancer Institute’s \$144.3 million initiative to incorporate nanotechnology into cancer research, scientists are developing drug-delivery systems based on nanotubes in conjunction with microelectrical array devices. Researchers already have identified electrical activity differences among certain cells and have created a library of signature patterns. The objective of the research is to replace the standard practice of injecting what often are toxic dyes into cells to find out which ones are cancerous.

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New Imaging Techniques for Brain Research

The use of magnetic resonance imaging (MRI) is revolutionizing neurological science, especially as it relates to mapping the brain to identify factors that influence people's ability to learn.

The use of magnetic resonance imaging (MRI) is revolutionizing neurological science, especially as it relates to mapping the brain to identify factors that influence people's ability to learn. MRI allows scientists to follow living, growing brains in the same individual over a period of time, gaining insight into how the human brain develops from childhood through adolescence and into adulthood. Unlike conventional x-ray and computed tomography (CT) scans, MRI does not depend on radiation. Instead, it is based on a strong magnetic field, so it is deemed a safer imaging technology. This technology has given scientists the tools and resources to investigate more fully the relationship between what is happening neurologically and what we observe and experience behaviorally.

Gray matter is the brain's nerve cells (neurons) and tiny branch-like tributaries known as dendrites. From infancy through early childhood, brain activity and growth occurs at the highest levels. Using MRI and other techniques and technology, scientists at National Institute of Mental Health, the Brain Research Institute at the University of California, Los Angeles, and Harvard University's McLean Hospital have discovered that the brain experiences a second wave of proliferation and pruning of gray matter that begins in the pre-puberty years, and extends into adulthood. Between the ages of 6 and 12, children experience a massive buildup of gray matter, which typically peaks in males at age 12 and in females at age 11. During this time, children develop enormous brain capacity that allows them to move from being highly skilled dependant learners to novice independent thinkers.

The use of molecular imaging also reveals that the proliferation of gray matter is followed by a pruning period that lasts for several years. During this stage, white matter – composed of fatty myelin sheaths – thickens and encases the axons of the brain cells making

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nerve transmission faster and more efficient. Pruning, also known as the “use-it-or-lose-it” phase, is critical to the developing adolescent brain. Neurons that are frequently stimulated will make connections with other neurons, allowing for growth; idle neurons wither and die. Nobel prizewinning neuroscientist Gerald Edelman has described this process as “Neural Darwinism.” Once the first connection is made, subsequent transmissions become faster and more efficient, resulting in greater long-term memory.

The amygdalae, almond-shaped structures located deeper and on either side of the brain, also play a significant role in the growing brain. They are often referred to as the emotional center because of their control over “gut reaction” and the “fight-or-flight” response.

Emotional response and irrational behavior, characteristics of many adolescents, have long been blamed on raging hormones. However, recent science has added brain development into the mix. MRI has shown that hormones released from the adrenal gland work their way to amygdalae, causing flare-up, which results in frequent emotional outbursts and leads adolescents to seek out exciting and thrilling experiences. Research also suggests that the emotional center of the adolescent brain holds control over the more rational frontal lobe area. This results in responding to situations with more emotion and gut reaction as opposed to a more executive, thoughtful, and measured response.

As scientists delve further into the exploration of the human brain with ever-advancing technologies, they continue to discover just how complex our children really are. On the one hand, their brains have a remarkable capacity for learning. On the other, the part of the brain most responsible for allowing rational decision making is not fully developed, and reactions to situations are dominated by the emotional center of the brain saturated with hormones. All this further challenges educators to provide stimulating instruction and activities that will foster learning for every student.

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Mechatronics

Mechatronics integrates aspects of mechanical engineering, electronic systems, control systems, and intelligent software. Major industries such as automotive, aerospace, medical, defense systems, manufacturing, and consumer products all are employing mechatronic systems designs.

With traditional mechanical systems, for example, often a driver is not aware of a system fault until failure occurs. But electronic devices and software can monitor the condition of car components at all times, alerting a driver if there is a fault in the system even before the fault leads to failure. To improve everything from fuel economy to car safety and performance, automotive researchers are combining many familiar mechanical auto systems with new electronic components and intelligent-software control. *Technology Review* writer David Talbot discussed the practical application of this hybrid approach for antilock brake systems. He describes how in the next five to 10 years electromechanical actuators will replace hydraulic cylinders, wires will replace brake fluid lines, and software will mediate between the driver's foot and the action that slows the car.

Cars in the future might also provide drivers with real-time information about traffic jams, traffic light cycles, and available parking spaces. Engineers are developing technology that will allow vehicles in close proximity to communicate with one another. This technology is still a few years away. In theory, however, cars equipped with wireless transponders will be able to broadcast information such as speed and braking status to nearby cars with similar transponders, helping to ensure greater safety on the road.

Many other well-known consumer products and appliances incorporate a hybrid system design in which traditional mechanical

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components are merged with mechatronic features so products function better. Equipment such as auto-focus cameras, video cameras, CD and DVD players, and washing machines, to name a few, all benefit from mechatronic systems.

Kho, J. "Cars May Find Parking Spots"

Biomechatronics

Biomechatronics, an offshoot of mechatronics, refers to the science of integrating mechanical or robotic systems with the human body. Like those who consider a career in mechatronics, students interested in biomechatronic must develop a multidisciplinary "tool kit" for their work, adding to their résumés coursework in biochemistry and related fields, in addition to engineering.

Therapeutic biomechatronic devices signify a new generation of prosthetics that work similarly to real limbs. Hugh Herr, head of the Biomechatronics Group at MIT's Media Laboratory, is a leading developer of new technologies for amputees. A double leg amputee himself, his work in biomechatronics is inspiring the next generation of artificial limbs in which sensors are distributed beyond the knee joint. This enables the prosthetics not only to detect mechanical forces of the body – as the Rheo Knee™ does – but neural signals from muscles near the knee joint as well. Herr predicts that within seven years, spinal cord injury patients, at least in research settings, will move their limbs again by controlling robotic exoskeletons to which they are attached.

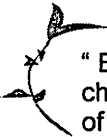
Technology Review. "10 Emerging Technologies"

Herr also is working on a biomechatronic prosthetic ankle prototype, for which he plans to be the first test subject. Three small sensors will be implanted in the muscles of one of his legs, below the knee. As the muscles are flexed in the manner that once moved his ankle, the sensors will measure the muscles' electrical impulses and relay the information to a computer chip in the prosthetic ankle. The

chip will translate the information into response instructions for the ankle's motors.

Language Translation Technology

If any one technology is indicative of how rapidly the boundaries of culture are shrinking across the globe, it is one that makes it possible to speak in one language and be understood in another. Language translation technology, which has been under development for at least 20 years, has recently produced promising results.



"Everything has changed but our ways of thinking. If we do not change these, we drift toward unparalleled catastrophe."
—Albert Einstein

Researchers at Carnegie Mellon University (CMU) in Pittsburgh are making momentous progress in advanced communication technologies so that, in as little as 10 years, technology may finally bridge the language divide between countries and cultures. During a demonstration at CMU, a researcher stood before an audience with 11 tiny electrode sensors attached to the muscles of his cheeks, neck, and throat. He proceeded to mouth – without speaking aloud – in Mandarin Chinese the phrase "Let me introduce our new prototype." The sensors captured the electrical signals from the speaker's facial muscles and relayed them to a computer. Not only did the computer recognize the words, but it translated them into both English and Spanish, displayed the phrase on the computer screen, and "spoke" the phrase in both languages. CMU researchers believe that even further into the future, electrodes could be implanted into a person's mouth and throat, essentially creating instant bilingualism.

Bails, J. "No Longer Lost in Translation"

Alex Waibel, a computer science professor at CMU who heads this research, also demonstrated "translation goggles." These high-tech eyeglasses display translated text on a miniature virtual screen that only the wearer can see. Waibel's speech was translated from

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spoken English into Spanish text, similar to how movie subtitles appear at the bottom of a television or movie screen.

From the Eastern European nations and Russia to India and China, we have witnessed the rapid spread of capitalism to more than half of the world's population in just 17 years. These nations saw the potential of what the free enterprise system can provide — in particular, a prosperous middle class. A century ago, the United States understood the challenge and enormous effort required to become a prosperous nation during a significant time of transition. Similarly, the Indians, Chinese, and Eastern Europeans recognize the energy and sacrifices required of them as individuals and realize the benefits of restructuring their countries from industry-based to information-based societies. Current trends suggest that these nations are very willing to put forth the effort needed to attain a middle-class standard of living for their citizens. Americans, in general, and our youth, in particular, seem to believe it is their birthright to enjoy a middle-class lifestyle and carry a false sense of security and comfort. Unfortunately, the result of such an attitude is that we, as a country, lack the drive needed to match the aggressiveness of other nations in the global economy.

Americans have consistently stood behind the notion that the United States is the premier superpower in the world. We do indeed have among the best — if not the absolute best — healthcare, highway, and educational systems compared to other countries. Yet, a common fear among scholars and economists is that Americans have been lulled to sleep by Asian and Eastern European nations with regard to the validity of our status as a superpower in the 21st century. The challenges facing many of our systems and structures with the rise of the global economy have significant implications for future generations. While many believe that the United States has calmly faced the rise of a global market, it has become quite clear that we

Globalization

The challenges facing many of our systems and structures, with the rise of the global economy, have significant implications for future generations.

India and China are producing more scientists and engineers each year than any other country in the world.

have awoken two sleeping giants – India and China – which are producing more scientists and engineers each year than any other country in the world. Not only must we be aware of the competitive edge India and China are developing, but we must also be cognizant of the changing demographics of the world as a whole.

We must realize that the future is now, and face the possibility that perhaps the United States has been too complacent. “We are no longer a big fish in a small pond,” says Navi Radjou, an analyst for Forrester Research. “We are a medium-size fish in a big pond, and some of the other fish are sharks.”

The Rise of India

Based on his linear stages of economic growth, economic historian W.W. Rostow’s concluded in 1952 that India reached “the interval when the old blocks of resistances to steady growth are finally overcome.” Rostow called this interval the takeoff, and calculated that India would reach its maturity – the state in which technological and entrepreneurial skills would offer that nation the ability to produce anything of its choosing – after about 20 years. This change, however, did not occur in 1972 as predicted. As recently as 1991, India was in dire financial straits. The newly elected finance minister decided that the only way to save the country from economic ruin was to abolish existing trade controls. Economic liberalization opened India’s doors to foreign investors and eradicated much of the bureaucratic red tape that had impeded business growth.

Thirty-five years later, the predicted change is finally underway. India has become one of the fastest growing economies in the world, boasting a population of 1.1 billion and a gross domestic product (GDP) of \$585 billion, double what it was just two years ago. More than half of India’s GDP is no longer agricultural, but is based on

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industrial growth and the services sector. What has become even more impressive is that at 8.3% India's GDP growth ranks second in the world and is expected to increase by 8-10% annually during the next 10 years. India's knowledge-based industries have become global models of excellence.

Ayres, A. and P.
Oldenburg. *India
Briefing: Takeoff
at Last?*

In addition to its effects in the political, financial, and social sectors, India also is playing an increasingly important role in information technology innovation. Motorola, Hewlett-Packard, Cisco Systems, and other technology giants rely on their Indian employees to design software platforms and futuristic multimedia features for next-generation devices. In December 2005, Microsoft announced that it planned to invest \$1.7 billion in India and nearly double its workforce there by adding 3,000 jobs over the next four years. Microsoft co-founder and Chairman Bill Gates said a substantial portion of the investment will go toward designing an operating system in nine native languages specifically for India.

Nonetheless, India still lags dramatically behind the United States in terms of the equity and excellence in the infrastructure and system of education. Of every 100 children who begin school, only 52 will reach the 5th grade. Only 85 out of 100 children have the opportunity to attend public schools. This trend is hardly surprising in a nation where 63% of births are not registered, 25% of babies are not immunized, and 16% of babies have no access to clean drinking water.

Business Week.
"Trying to Tame the
Blackboard Jungle"

Despite the infrastructural obstacles facing the country, government officials have committed themselves to policy reforms that will improve the quality of education offered to all students in the immediate future. A newfound belief in educating every child has become a mantra, and there have been strong efforts to establish a higher-education system that embraces the potential to serve the

nation's academically best and brightest. India's seven Institutes of Technology, Science, and Mathematics have become the premier institutions of higher education.

On average, the institutes receive more than 400,000 applicants each year for only 4,000 places. This highly competitive admissions process motivates and encourages students. The decision to invest in the nation's most intelligent students has enabled India to position itself favorably in the world economy, which, in turn, has propelled the country to the status of a leader in the areas of science, mathematics, and technology. India's devotion and investment will secure its place as a major player in the world market and a competitor to watch.



"The best way to cope with change is to create it."

—Thomas Feranda,
international speaker
and business expert

The Rise of China

"To get rich is glorious," declared China's leader in 1977, signifying the opening of the world's most populous country to international trade. In China today, there is no question that communist ideology takes a backseat to capitalism in terms of economic growth. For the past two decades, China's average annual economic growth has been at a rate of 9.5%. If this continues, China's economy could be 75% larger than that of the United States by 2050.

China's population is about 1.5 billion and is projected to increase by 60 million people by 2012. There are more cities in China with populations of one million people or more than in Europe and the United States combined. Along with opening its economy to free enterprise, the Chinese government made another radical concession: allowing peasants to leave the countryside to search for opportunities in urban areas. Hundreds of millions of people — more than the total workforce population of the United States — have migrated to coastal cities hoping to make better lives for themselves.

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By 2020, China is expected to have 1.1 billion workers, which will require the creation of 10 million jobs annually to be sustained.

Whether or not we realize it, China's consumers, vendors, employees, employers, and manufacturers have an impact on our lives every day. In the not-so-distant past, a product labeled "Made in China" would never have been mistaken for a German-made machine, a Japanese-made television, or an American-made cabinet or textile. This is no longer true.

The fact is, China leads the world in the number of clothes made and toys assembled. China makes more than 40% of all the furniture sold in the United States. In early 2000, China became the world's largest manufacturer of consumer electronics. China now has the second largest personal-computer market, the largest mobile phone market (25% ownership), and the third largest retail market in the world, which is growing by 10% annually. China is now the largest producer of coal, steel, cement, color televisions, and cell phones, according to David Arkless, executive board member of Manpower.

The Chinese have become focused on ensuring their success as an economic stronghold, both in the public and private sectors. Now one of the world's largest oil importers in the world, China also is one of the largest investors in oil exploration. As Thomas Friedman points out in his bestselling book, *The World Is Flat*, in the private non-state owned sector of Chinese industry, productivity increased 17% annually between 1995 and 2002. Now, with its membership in the World Trade Organization, China is powerfully poised in the global economy, a position that is only strengthened by its efforts to collaborate with other nations.

At the root of China's success in the world market is its strong education system. The country produces some of the world's

Fishman, T. *China, Inc.*

The Chinese have become focused on ensuring their success as an economic stronghold, both in the public and private sectors.

brightest students, who, in turn, become world-class business managers, scientists, and engineers. China is still identified by many of India's educated and influential as the most likely source of insecurity to India and the greatest potential long-term threat to that country's interests. The United States may be wise to consider China in much the same manner.

If we truly value children as our greatest national resource, we must invest in their future. The United States may not have the massive human resource numbers as China or India, but education can be the great equalizer.

Regaining the Advantage

Countries such as India and China are on the fast track to competing vigorously with the United States and other countries on every economic issue and investment. The rise of these two countries and others in Eastern Europe should inspire Americans to consider what we are doing to prepare future generations for competing in the race to the top. However, we must do so quickly. The longer we wait to take action, the sooner we will find ourselves buried too deeply in the complex sands of this global pursuit.

The challenges facing the United States in this pursuit are numerous. If we truly value children as our greatest national resource, we must invest in their future. The United States may not have the massive human resource numbers as China or India, but education can be the great equalizer. The United States has proven that it could invest in education in the past and that investment led us to become the most powerful nation on Earth. We must summon the will to do so again. This means providing better classrooms in all regions of the country, raising education standards to reflect the relevancy of the times, and restoring a sense of national pride in our education system.

Developing nations in Asia and other areas of the world place a premium on educating students to excel in industries that will drive the future global marketplace. While the number of scientists and

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engineers who graduate from Indian and Chinese universities is increasing, American universities are awarding fewer degrees in science and engineering every year, and many of those go to international students. Higher education in the United States continues to have excellent standing worldwide, but increasing numbers of foreign students are taking their diplomas back home, some because they believe their quality of life will be better and some because they cannot obtain visas to remain in the United States to work.

The United States remains unsurpassed in research and development, but that will change if we cannot recruit, educate, and keep talent within our borders. Countries whose economies are growing two or three times faster than ours can offer opportunities for elite students that are too tempting to pass up. Moreover, in India, wages for skilled workers is a fraction of that for a comparable job in the United States, so it is no surprise that many major American companies, such as Microsoft and Intel, are investing there. In the last four years, IBM has invested \$2 billion in research and development in India, where it has about 43,000 employees. In the next two years, the company expects to invest another \$6 billion.

In 2008, the oldest of the baby-boom generation will be 62 years old, marking the first wave of early retirees from the largest generation in United States history. With so many workers phasing out of the labor force and not enough new talent entering, many of the nation's leading financial experts see dark days ahead for the American economy. The fast-rising costs of healthcare benefits for retirees, coupled with the strain that baby boomers will place on the Social Security system and the high cost of many existing pension plans, have budget watchdogs warning of severe fiscal trouble. In fact, terms such as "fiscal hurricane" and "death spiral" have been used to underscore just how serious the situation is. In a 2005 *USA*



"We can and should shape the future, because if we don't someone else will."

—Joel Barker,
business expert

Demographics

Today article, former U.S. comptroller general David Walker said, "We face a demographic tsunami [that will] never recede."

Social Security and Medicare

Wolf, R. "As Social Security Surges and Medicare Takes Off, the Deficit Will Soar. The Result: 'Fiscal Hurricane'"

Barring major cuts in spending, tax increases, or both, the national debt is projected to grow to \$11.2 trillion in 2010, or about \$38,000 for every person in the United States. Unless the American public and elected officials are able to agree on some difficult structural modifications to fiscal policy, our nation will experience a potentially devastating economic recession. Such changes will require sacrifice, and politicians tend to get cold feet when it comes to talking about the taxpayers' money. Leon Panetta, former White House budget director and chief of staff to President Bill Clinton, observes: "The choices you have to make [to balance the budget] are almost exactly the opposite of what wins political elections."

Experts predict that the aging population, a disproportionate ratio of retirees to job market entries, and healthcare inflation will spin the federal deficit out of control. In their 2006 annual report, the trustees of Social Security and Medicare estimate that the Social Security trust fund will be insolvent in 2040, while the Medicare trust fund will be depleted in 2018, earlier than previously projected. Consider the following:

- Prescription drug coverage under Medicare took effect on January 1, 2006. The projected cost of coverage in 2003 was \$400 billion over 10 years. Current projections place the cost at more than \$720 billion over 10 years.
- The number of people covered by Social Security is expected to grow from 47 million in 2005 to 69 million by 2020. By 2030, the Congressional Budget Office projects that Social Security spending as a share of the country's economy will rise by 40%.

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- Baby boomers will be eligible for Medicare starting in 2011. If the cost of Medicare coverage grows just 1% faster than the economy – a conservative number – Medicare will cost \$2.6 trillion in 2050 (after adjusting for inflation). This figure is about the same as the entire current federal budget today.

Sahadi, J. "Social Security, Medicare to Run Out Sooner"

Workers have looked forward to retiring at age 65 since Social Security was implemented in the 1930s. The retirement age has not increased even though life expectancy has significantly increased. In the 1930s, age 65 was still well beyond the average life expectancy, so most people worked until death. In addition, the retirement age helped to keep the American workforce fluid by continually pumping new employees into the jobs vacated by retirees and those who died.

Today, the average retirement age is down to 62 years, but the average life expectancy is up to 77. Prolonging life was and continues to be a result of advancements in healthcare. Experts in geriatrics and genetics expect the increase in longevity we experienced during the last century to continue throughout this one. Even greater advancements and breakthroughs in healthcare and pharmaceuticals are predicted to keep the average American alive to the unfathomable age of 107 by the year 2100. If this prediction is realized, by the end of this century, an average American who lives until age 107, will have started working at age 21 and retired at age 62, meaning more years will be spent in retirement than in the workplace.

Wolf, R. "More Patients Fall into a Hole in Drug Benefit"

The fiscal woes of Social Security and Medicare have been well documented. Increasingly, they are functioning as a transfer of money from the lesser affluent younger generations to the already wealthier older generation. Because the baby boomer and older generations have not set aside enough funds to cover the promised benefits and pension plans, the younger generations will be forced to cover the difference or the elderly will be forced to relinquish

some of what has been promised to them. Over the next 75 years, the shortfalls of Social Security and Medicare are estimated at \$340,000 per household, far in excess of the wealth of every age group. Rather than accumulating wealth, like generations before had the opportunity of doing, younger people will spend their long lives struggling to get out of debt.

New Student Generations

As we strive to understand the students in our classrooms, it may be helpful to look at the characteristics of the two generations that currently are in our schools. Experts calculate that generations span about 22 years. Right now, the Millennials – born between 1982 and 1998 – and Generation Z – born between 1999 and the present – attend our schools.

The Millennials are predominantly students in middle school, high school, and college. They are children who are from the most “watched-over” generation by their parents and a generation that has grown up with and is fluent with technology. Their world has always had personal computers, cell phones, and the Internet. They are a generation that works well in groups. They also represent a group that has maintained busy schedules growing up, juggling schoolwork, social interests, and myriad sports activities. As a result, they tend to be good multitaskers.

Generation Z is still in elementary school. Because they are so young, not a great deal is known or understood about this generation, but they are beginning to be identified with certain trends. This, too, will be a generation of multitaskers. They are a “connected generation” whose world has always had broadband and wireless access. The cell phones that they know facilitate multitasking. They are already fairly well acquainted with digital cameras and DVD recorders, MP3 players, gaming stations, Web browsers and text messaging devices. Generation Z will be the first generation likely to live into the 22nd century in large numbers.

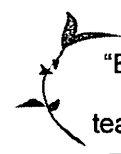
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These two generations provide our traditional classrooms with interesting challenges and opportunities. When they are seen playing video games, those of us who teach often liken it to the passive activity of television watching as we knew it growing up. In fact, the similarities end when looking at the screen. Video games provide these children with an opportunity to role-play in a multitude of roles and scenarios.

These are youngsters who are sometimes accused of having short attention spans. However, researchers now believe that this is a group that has a strong ability to process multiple stimuli at once. They have always been able to work between multiple applications on their computers and electronic devices. Here again is their strong ability to multitask.

Because these generations are multitaskers and team players, our schools must be rich environments in which students are presented with real-world problems that challenge their skills and empower their spirit of teamwork. They must feel that they have a level of control over their educational choices and, just as in video games, they must be enabled to accomplish each level and advance to more challenging levels. Teachers must engage these students in finding new ways to incorporate this generation's technological savvy into learning.

Mark Prensky, well-known author and speaker on the topics of education and learning, refers to today's students as "digital natives." They are all native speakers of the digital language that drives cell phones, the Internet, and video games. Prensky explains that their teachers are the "digital immigrants," who generally struggle to learn this new language. Like all immigrants, educators can learn a great deal if they listen to the native speakers.



"Educational change depends on what teachers do and think — it's as simple and as complex as that."
— M. Fullan and S. Steigelbauer

Prensky, M. "Listen to the Natives"

Section Summary

The context of society upon which we have designed our schools has changed and will continue to change. The school calendar, length of school day/year, teaching assignments, and student achievement measures are traditions that have outlived their purposes.

It is a bit overwhelming as a teacher or administrator to reflect on these significant and rapid changes in technology, global and social trends, and demographics. Coupled with the noticeable changes in the characteristics of young people in school, these are significant challenges. The reaction of many educators of this information overload is to ignore it, hoping things will slow down. But the worst reaction is to take no action.

There are several important themes that emerge as educators pay attention to these driving forces of change. One is that the context of schools has changed. The context of society upon which we have designed our schools has changed and will continue to change. The school calendar, length of school day/year, teaching assignments, and student achievement measures are traditions that have outlived their purposes. It makes little sense to continue structures and procedures that were designed around a different time.

Moreover, when it comes to educating and grading our students, skills must trump content. Schools cannot approach teaching by focusing on all the “basic” content that exists in today’s world that well-meaning educators might agree should be part of the curriculum. It is more important to focus on the skills learned in that students are able to obtain, manipulate, and use the content taught in the classroom. Educators must find ways to modify teaching so that skills become more important than specific content.

Important changes must be made in schools, not because they are mandated by government or because another school is establishing a particular initiative that everyone else needs to copy. Changes are driven by the forces of our society and schools must keep pace if they are to fulfill the role of preparing students for a dynamic future.

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Finding successful practices in K-12 education that adequately prepare students for a changing world has been the purpose of the International Center since its inception in 1991. In focusing on this purpose, the International Center created a basic philosophy: *rigor and relevance for ALL students*.

Although school districts across the country are increasingly using the words “rigor” and “relevance,” these terms are seldom defined. At the International Center, rigor and relevance are more than catchy words; they are part of a framework for defining what to change in schools and how to organize curriculum and instruction to prepare all students for the future.

“Relationships” was added as the third “R” based on the work with exemplary schools. Strong relationships are critical to completing rigorous work. Students are more likely to make a personal commitment to engage in rigorous learning when they know that teachers, parents, and other students actually care about how well they do. Relationships are the foundation on which rigor and relevance are built.

Defining Rigor

Academic rigor refers to learning in which students demonstrate a thorough in-depth mastery of challenging tasks to develop cognitive skills through reflective thought, analysis, problem solving, evaluation, or creativity. It is the quality of thinking, not the quantity, that defines academic rigor, and rigorous learning can occur at any school grade and in any subject.

Aspire for Rigor, Relevance, and Relationships for All Students

Students are more likely
to make a personal
commitment to engage
in rigorous learning when
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parents, and other
students actually care
about how well they do.

Defining Relevance

There are students who do extremely well academically but who seem to be dysfunctional in the world beyond school. They lack the ability to apply their knowledge to real-life situations.

Relevance refers to learning in which students apply core knowledge, concepts, or skills to solve real-world problems. Relevant learning is interdisciplinary and contextual. Student work can range from routine to complex in any grade and any subject. Relevant learning is created, for example, through authentic problems or tasks, simulations, service learning, connecting concepts to current issues, and teaching others.

There are students who do extremely well academically but who seem to be dysfunctional in the world beyond school. They lack the ability to apply their knowledge to real-life situations. Rigor without relevance can enable students to be successful in school, but result in failure once they no longer have that structure and guidance.

Rigor/Relevance Framework

To help educators better understand these concepts and their importance to creating high-quality educational experiences that enable student success in and beyond the classroom, the International Center created the Rigor/Relevance Framework™ in the mid-1990s. The Rigor/Relevance Framework is based on two dimensions of higher standards and student achievement: knowledge and application.

There is a continuum of knowledge that describes the increasingly complex ways in which we think. In defining rigor in this framework, we use the Knowledge Taxonomy, which is based on the six levels of Bloom's Taxonomy:

- Knowledge/Awareness
- Comprehension
- Application
- Analysis

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- Synthesis
- Evaluation

The second continuum, created by the International Center, is known as the Application Model, which recognizes that learning increases in complexity with higher levels of application. This scale can be used to describe increasing relevance. The five levels of this action continuum are:

- Knowledge in one discipline
- Apply knowledge in a discipline
- Apply knowledge across disciplines
- Apply knowledge to real-world predictable situations
- Apply knowledge to real-world unpredictable situations

The Application Model describes how knowledge is put to use based on the levels of relevance. The high end signifies action — using the knowledge to solve complex real-world problems and to create projects, designs, and other works for use in real-world situations.

The Knowledge Taxonomy and Application Model are not separate scales, but are connected and relational. Often, as relevance is increased, so too is the knowledge level. The Rigor/Relevance Framework, illustrated on the following page, uses four quadrants that represent levels of learning. On the Knowledge Taxonomy axis, the framework defines low rigor as Quadrants A and B and high rigor as Quadrants C and D.

Chapter 3 Why Change and How to Do It

Rigor/Relevance Framework™

K T a x o n o m y e	Evaluation	6					
	Synthesis	5					
	Analysis	4					
	Application	3					
	Comprehension	2					
	Knowledge/Awareness	1					
			1	2	3	4	5
			Knowledge in one discipline	Apply in discipline	Apply across disciplines	Apply to real-world predictable situations	Apply to real-world unpredictable situations
			Application Model				

In Quadrant D, “Adaptation,” students have the competence to think in complex ways as they apply knowledge and skills they have acquired to new and unpredictable situations.

Quadrant A represents simple recall and basic understanding of knowledge for its own sake. Quadrant A is labeled “Acquisition” because students gather and store bits of knowledge and information.

Quadrant C, “Assimilation,” represents more complex thinking, but still knowledge for its own sake. In Quadrant C, students extend and refine their acquired knowledge to be able to use it automatically and routinely to analyze and solve problems and to create unique solutions.

Quadrants B and D represent actions or high degrees of application. In Quadrant B, “Application,” students use acquired knowledge to solve problems, design solutions, and complete work. In Quadrant D, “Adaptation,” students have the competence to think in complex ways as they apply knowledge and skills they have acquired to new and unpredictable situations. Students create solutions and take actions that further develop their skills and knowledge.

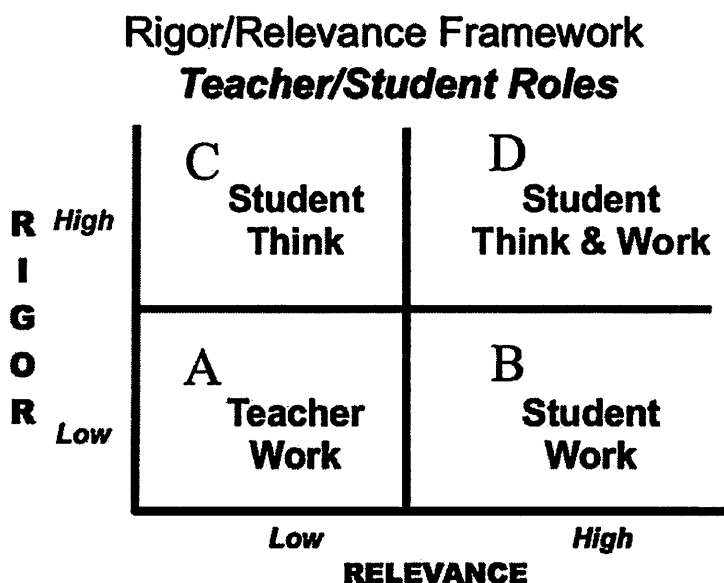
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For students to become lifelong learners, problem solvers, and decision makers, Quadrant B and D skills are required. In effect, our students need to know what to do when they do not know what to do. The Rigor/Relevance Framework provides a structure to enable schools to move all students toward that level.

One way to think about the Rigor/Relevance Framework in day-to-day instruction is in terms of the roles that teachers and students take. When instruction and expected student learning is in Quadrant A, the focus is on “teacher work.” Teachers expend energy to create and assess learning activities — providing information, creating worksheets, and grading student work. The student is often a passive learner.



“Progress is impossible without change and those who cannot change their minds, cannot change anything.”
– George Bernard Shaw, writer and art critic



When student learning moves to Quadrant B, the emphasis is on the student doing real-world work. This student work often is more

complicated than Quadrant A work and requires more time. Learning in Quadrant B is best described as “student work” because students are doing extensive real-world tasks.

Learning in Quadrant C is best described as “student think.” In this quadrant, students are expected to think in complex ways to analyze, compare, create, and evaluate. The term that best describes Quadrant D activities is “student think and work.” Learning in Quadrant D is more demanding and requires the student to think and work. Roles shift from the teacher-centered instruction in Quadrant A to student-centered instruction in Quadrants B, C, and D. Teachers still work in Quadrants B, C, and D, but their role is more as a coach or facilitator.

Defining Relationships

We are social/emotional creatures, and we recognize, respond to, seek out, and develop connections with other people. Relationships are a description of the nature and quality of these connections. In the same way the Rigor/Relevance Framework has helped define knowledge and application, a clear taxonomy for relationships can drive improvement in connections related to learning.

The Relationship Framework, created by the International Center, describes seven levels of relationships.

Level 0 is Isolation. This is the lack of any positive relationships. The individual feels alone and isolated from relationships that would enhance learning.

Level 1 is Known. A person must know someone before a relationship is formed. When teachers seek to develop relationships with students, the first step is getting to know them — their likes, dislikes, aspirations, learning styles, and families.

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Level 2 is Receptive. Often a learning relationship is described in terms of providing the assistance and support that a student needs. However, a preliminary step is for a teacher, for example, to show genuine interest in developing a relationship. This comes from frequent contact in multiple settings and active involvement.

Level 3 is Reactive. In this case, one person receives guidance or support from another. This relationship yields emotional support or cognitive information.

Level 4 is Proactive. At this level, the partners have made a proactive commitment to do more than assist when needed and take an active interest in supporting the other person.

Level 5 is Sustained. Positive support is received from family members, peers, and teachers. These are relationships that will endure over a long period of time. This is the level of relationship that effective parents have with their children.

Level 6 is Mutually Beneficial. This level occurs rarely in education, for at this point, both parties contribute support to one another for an extended period of time.

The Relationship Framework helps to identify the changes that need to be made to improve relationships. Once teachers make relationships important, they can begin to reflect on current practices and discuss how to improve relationships. Relationships are not simply good or bad; they exist on a continuum. Furthermore, relationships can change over time. The Relationship Framework is useful because it first helps teachers understand that there are degrees of relationships. When they think about their relationships with students, teachers can use the framework to apply a qualitative measure to the relationships they make. This qualitative measure helps them to reflect on their current levels and allows them to decide if they wish to make changes to improve relationships.

Once teachers make relationships important, they can begin to reflect on current practices and discuss how to improve relationships.

When relationships are categorized as a simple dichotomy of good or bad, teachers are not likely to reflect on their practices or make self-directed changes. If relationships are “good,” there is no need for change.

When relationships are categorized as a simple dichotomy of good or bad, teachers are not likely to reflect on their practices or make self-directed changes. If relationships are “good,” there is no need for change. If relationships are “poor,” it is easier to become defensive, blame the other party, or simply accept things for the way they are. When a leveled framework is used for describing relationships, it has a different effect on teachers. Even if relationships are poor, there are at least some positive aspects on which to build. This makes teachers less defensive.

At the other end of the scale, relationships categorized as generally “good” are usually never as good as they could be. There is the potential for growth and further improvement. This motivates even the best teachers to continue to work on improving relationships and strive to reach higher levels. In this scenario, all teachers need to work on improving relationships regardless of the current level of success.

Begin with the End in Mind

Knowing that students need a rigorous and relevant curriculum taught in a climate of positive relationships is an important step in school reform. Many educators know the importance of rigor, relevance, and relationships in an ideal learning environment, but they need more specific direction. They wonder: Where do we start? Where are we now? Where do we want to go? All these questions need to be defined in concrete quantifiable terms.

The answer to the question “Where?” is to know where you want end up as a result. Without a destination in mind, one road is as good as another. Any change can be considered. Schools need to know where they are going before they try to get there. While this may seem like common sense, most schools do not begin with a clear picture of what their desired student results are. Instead, schools jump into changes and solutions because that seems like

Leading Change in High Schools

the thing to do — be proactive, make a change, adopt a practice that is working somewhere else. Schools do need to change, but changing too quickly or attempting to make changes without a clear destination will not be effective.

Where to begin change is not with best practices but with the school clearly focused on the end result. By having clear comprehensive indicators of student learning, schools are better prepared to select, adapt and implement best practices that will make a difference.

Schools operated for a long time independent of formal and quantitative accountability systems. Over the past few decades, we have created stronger accountability measures, but they focus only on a few aspects of schools – English language arts, mathematics, and science. This seems like the right thing to do. Who can argue with making sure that students acquire these basic skills? However, the impact on schools has been to make significant changes just to raise a test score. Practices such as eliminating recess and reducing instruction in the arts and technical courses have occurred to the detriment of students. Schools need to be cautious in making changes when the measures of success are so narrow.

The problem is that schools have left the designation of accountability measures to federal/state mandates. Schools need to be more proactive in designing their own comprehensive set of measures to determine education effectiveness.

Educators today feel conflicted about accountability measures that are limited in scope yet powerful in consequences. As a result, they feel like they are driving a car down the highway only looking out the right side window. They are forced to pay attention to one aspect when they truly believe that they should be looking in all directions. Educators are tense in this dilemma of limited measure

A Narrow Focus

Practices such as eliminating recess and reducing instruction in the arts and technical courses have occurred to the detriment of students.

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of accountability as if they were waiting for a collision to happen. Stepping back and redefining learning measures in a more comprehensive manner, including but not limited to state tests, will enable educators to embrace goal-setting and accountability measures that are more consistent with what they believe about teaching and learning.

Following are several questions that will help focus on the need for revised accountability measures.

- How do you identify school success?
- How do you describe an “educated student” in your school?
- Does the school community have a way to measure success? Is it the same way others measure your success?
- Are state tests the only thing that matters? If not, what else does?
- Does being judged only on state tests narrow the focus of work?
- How do you measure whether school improvements are working?
- How do you focus your school community on the needs of students?
- Do current measures of student learning fail to identify some of your “best students”?

Learning Criteria

The Learning Criteria to Support 21st Century Learners,[™] developed by the International Center, is an opportunity for schools to translate their beliefs about teaching and learning into measurable goals. This is an essential and unique aspect of the International Center's model for change, clarifying where schools want to be heading and establishing specific measures to set goals and monitor progress. In the hands of a thoughtful and broad-based

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school leadership team, the Learning Criteria helps schools clarify their missions, prioritize problems and interventions, and critically review school performance. Further, these analyses provide critical rationales for establishing goals and developing action plans. Most importantly, the data generated by the Learning Criteria reflects the needs of learners in ways that less complex and more traditional measures overlook. The Learning Criteria is designed to provide a robust, comprehensive, and detailed portrait of school performance that clearly maps out a route for school improvement efforts.

The Learning Criteria is designed to provide a robust, comprehensive, and detailed portrait of school performance that clearly maps out a route for school improvement efforts

The Learning Criteria is arranged in four data categories that school leaders can use to determine the success of their high schools in preparing students for current assessments and future roles and responsibilities. A school should have data indicators in all of the categories, and at least one indicator in each category should apply to the entire student population.

Core Academic Learning is achievement in the core subjects of English language arts, math and science and others identified by the school.

Stretch Learning is the demonstration of rigorous and relevant learning beyond minimum requirements (participation and achievement in higher level courses, specialized courses, etc.).

Learner Engagement is the extent to which all learners (1) are motivated and committed to learning, (2) have a sense of belonging and accomplishment, and (3) have relationships with adults, peers and parents that support learning.

Personal Skill Development encompasses (1) measures of personal, social, service, and leadership skills and (2) demonstrations of positive behaviors and attitudes.

Learning Criteria Data Indicators

The specific data indicators used will vary among schools based upon state requirements and school philosophy, focus, and curriculum. However, to identify success and maximize its usefulness, data collected through the Learning Criteria framework must be examined from the following perspectives:

- **School Performance** – Expressed in objective terms
- **Sustained** – Trend data to show improvement or maintenance at high levels for 3-5 years
- **Disaggregated** – Comparisons in achievement among all subgroups
- **Benchmarked** – Compared to similar schools, schools in state, school in nation or accepted norms from national/state surveys, reports

The identification of data indicators for the Learning Criteria is the start of a process that is meant to be dynamic and continuous. Few schools initially will have all the data necessary to complete the Learning Criteria. It will take time and several steps to move through the process. Here is a review of the four Learning Criteria categories and sample indicators.

Core Academic Learning refers to achievement in the core subjects of English language arts, mathematics, science, and other subjects identified by the school. Sample data indicators include:

- percentage of students meeting proficiency level on state tests (required)
- average scores on ACT/SAT/PSAT tests
- achievement levels on standardized tests other than state exams

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- percentage of students requiring English/mathematics remediation in college
- follow-up surveys of graduates' academic achievements
- percentage of students graduating high school in four years
- percentage of students earning a college degree within four years after high school completion
- Armed Services Vocational Aptitude Battery score

Stretch Learning refers to the demonstration of rigorous and relevant learning beyond minimum requirements through participation and achievement in higher-level or specialized courses. Sample data indicators include:

- number of credits required to graduate
- average number of credits earned at graduation
- interdisciplinary work and projects, such as a senior exhibition
- participation/test scores in International Baccalaureate courses
- average number of college credits earned by graduation through dual enrollment
- enrollment in advanced mathematics or science courses
- enrollment in Advanced Placement (AP) courses, scores on AP exams, and percentage of participants achieving a score of three or higher on a five-point scale
- percentage of students completing career majors or career/technical education programs
- four or more credits in a career area
- four or more credits in arts
- three or more years of foreign language
- value of scholarships earned at graduation
- achievement of specialized certificates (e.g., Microsoft, Cisco Academy)

Stretch learning is the most difficult of the criteria because it compels schools to define how they are stimulating and stretching each student and not just the best and brightest.

Stretch learning is the most difficult of the criteria because it compels schools to define how they are stimulating and stretching each student and not just the best and brightest. It challenges a school to find data to validate the claim that “all students will ...” If students truly are being stretched, then they will spend most of their time in Quadrants C and D of the Rigor/Relevance Framework.

Learner Engagement is the extent to which all learners (1) are motivated and committed to learning, (2) have a sense of belonging and accomplishment, and (3) have relationships with adults, peers, and parents who support learning. Sample data indicators include:

Students need to be engaged before they can apply higher-order, creative thinking skills.

- student satisfaction surveys
- student risk behaviors
- dropout rate
- attendance rate
- graduation rate
- discipline referrals
- participation rates in extracurricular activities
- follow-up survey about enrollment in higher education
- percentage of students taking ACT or SAT
- tardiness rate
- surveys about degree to which teachers know their students
- surveys about positive peer relationships
- percentage of students going to two-year colleges
- percentage of students going to four-year colleges

Students need to be engaged before they can apply higher-order, creative thinking skills. They learn most effectively when the teacher makes sense and meaning of the curriculum material being taught. This can only happen if the teacher has created a safe learning environment that encourages students to meet challenges and apply skills to real-world unpredictable situations inside and outside of school.

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Personal Skill Development includes (1) measures of personal, social, service, and leadership skills and (2) demonstrations of positive behaviors and attitudes. Sample data indicators include:

- service learning participation
- students holding leadership positions in clubs or sports
- assessment of personal skills, such as time management, ability to plan and organize work, leadership, being a team player, etc.
- respect for diversity
- teamwork
- trustworthiness, perseverance, other character traits
- conflict resolution
- reduction in number of student incidences of conflict
- follow-up survey of graduates about development of personal skills

Personal skill development gets to the heart of what makes a citizen, friend, or community member. What are schools doing to promote these qualities?

Think about a son or daughter's new friend. Are you more concerned about the friend's grades or his or her character qualities? Personal skill development gets to the heart of what makes a citizen, friend, or community member. What are schools doing to promote these qualities? Are they making leadership opportunities available for all students? Are they creating a curriculum that teaches these skills and making them graduation requirements?

Schools that create an environment in which everyone understands the *why*, agrees with the *what*, and focuses on the *where* have an advantage and are well on their way to implementing successful change. However, implementing the *how* for many educators is still a challenge. Dealing with this challenge begins with better understanding the nature of schools as unique systems.

Much of today's K-12 curriculum is still set up to support what is now an obsolete industrial era, with a rigid school year in which

Schools as Living Systems

Chapter 3 Why Change and How to Do It

every student must learn the same knowledge in the same way over the same period of time. Even school buildings generally look much as they did 50 years ago.



“A child’s mind is not a vessel to be filled, but a fire to be kindled.”
– Plutarch, Greek historian and essayist

But we know from observation that schools that closely follow this industrial model are not the most successful. While we can hold learning of basic skills as a universal minimum requirement, learning must be personalized to allow for students who learn at different speeds and through different experiences. Learning is more organic and unpredictable. Greek historian and essayist Plutarch reminded us that a child’s mind is not a vessel to be filled, but a fire to be kindled. Another way to explain the learning process of our youth is comparing it to a growing plant, which gradually adds new stems and leaves as it constantly absorbs fresh nutrients and strives to maintain an equilibrium to survive. And, just as learning can be seen as a biological process, schools should be thought of as biological systems that create environments for good teaching and learning.

The business world is full of best practices for improving the quality of manufacturing systems. Manufacturers begin with selecting high-quality resources, monitoring processes constantly for quality, and automating to improve efficiency. Some of these quality processes, such as cause-and-effect diagrams or scatter diagrams can work in education, but schools have many more variables than manufacturing. Most important, they must take every student regardless of disability, language barriers, or home situation. Also, the behaviors of people are much less predictable than the routine operation of machinery and robots in manufacturing.

Biological organisms are complex phenomena that are heavily influenced by their ever-changing environments. In the natural world, each organism is part of an intricate ecosystem and any event that influences one organism has an impact on another. This analogy certainly can be applied to schools, where one intervention

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can have significant unintended outcomes. In essence, to continue to provide students with a rigorous and relevant education, schools must adapt and change in relation to today's world. In this way, biological systems seem to describe more clearly the complex interrelationships and learning processes that make up school organizations.

Living systems differ in significant ways from traditional closed industrial systems. In living systems, the function drives the organization. While schools often perpetuate existing organization structure, the most effective schools have created organizational changes to reflect the function they want to accomplish. Many industrial systems try to eliminate outside environmental influence. This is impossible in schools. Every student every day brings in the outside community. Successful schools must adapt to those outside influences. In most systems, there is a defined start and conclusion. Schools, definitive of living biological systems, are constantly growing and have flexible beginnings.

Schools as Living Systems

In Most Systems:

- Organization drives function
- The goal is to isolate from external influences
- There is a well-defined beginning and end
- Control is through clear processes and procedures
- Innovation uses design prototypes and research

In School Systems:

- Function drives organization
- The goal is to adapt to external influences
- Beginning/end are flexible, focus on constant growth
- Influence through leadership and social networks
- Innovation uses experiments and risk-taking

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In most traditional systems, procedures are well defined and can be maximized for efficiency. The people in a school system are less confined to procedures. Change comes not so much from changing a procedure, but from the social networks and people skills. Finally, living systems innovate more from experimentation than from the careful design and testing typical of an industrial system.

Traditional Systems Leaders	Living Systems Leaders
Avoid mistakes	Innovate
Deliver results now	Think long term
Cut costs	Increase morale
Reduce staff	Improve teamwork
Respect the rules	Be flexible
Compete	Collaborate
Retain control	Decentralize

Applying Common Characteristics of Living Organisms

What are the common characteristics of living organisms, and do they give us any insight into how schools need to operate to be successful? High school biology students can list the five common characteristics that define living organisms, which are:

- made up of cells with unique DNA
- obtain and use energy
- grow and develop
- adapt to their environment
- reproduce

These five characteristics provide a vision of what successful schools need to be to serve students well. Rather than focus

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on the quality of manufacturing, standards of construction, and efficiency of marketing and distribution, schools should strive for the characteristics of living things, which are as follows.

Identity. A school defines its identity through a clear vision and mission. Identity also refers to the school's unique student body. Each student brings unique interests, background, and abilities to the learning community.

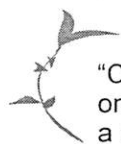
Vitality. Vitality is the energy and passion that students and staff exhibit toward teaching and learning. Schools that are well designed, attractive, adequately maintained, and have sufficient resources contribute to a vitality that supports learning.

Maturity. This is a measure of how a school moves from pockets of innovation to a common culture of practice. Mature schools recognize and deal with changes in an insightful, timely, and effective manner. This is one of the most difficult of characteristics to achieve. When schools reach maturity, there are well-established procedures and staff are comfortable and confident in handling challenges that arise.

Adaptability. Just as living organisms adapt to the environment, schools adapt to their communities and deal with external changes. As community demographics change or new students arrive in the school, the school must adapt to handle these new students. When schools are imposed with new requirements or changes in funding, they must adapt.

Sustainability. This refers to schools preparing adequately for the future and make decisions that reach for long-term goals. Whether it is "staying the course" in an innovative program to finally achieve results or preparing the next generation of teachers, sustainable schools have the competence and confidence to retain their successful status.

How Do Schools Attain Characteristics of Biological Communities?



“Change is not a one time event, but a process which must be constantly managed.”

– Daryl Conner, change management expert and author of *Managing at the Speed of Change*.

Characteristics	
Living things	Living schools have
are made of cells	identity
obtain and use energy	vitality
grow and develop	maturity
adapt to their environment	adaptability
reproduce	sustainability

So, how do schools change to achieve these characteristics? Again, nature provides an answer. Many organisms mature and adapt to their environment through (1) sensory feedback, (2) modeling others, (3) building relationships, (4) managing resources, and (5) taking risks. The following list of five processes, based on these five characteristics, encompasses some of the best practices in school improvement.

Data reflection. Schools today are using data more extensively to make decisions. This is equivalent to the way living organisms sense where they are, where food is, and when danger is near. Data leads to timely decisions and better actions. Just as organisms sense their physical environment, schools sense their learning environment through data.

Adopting best practices. Many animals learn through copying the behaviors of older generations. Young children learn language from listening and modeling adults. Schools can grow and change from modeling the practices of other schools.

Building relationships. Living organisms build social and symbiotic structures to survive. Schools change through relationship building as well.

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Resource allocation. Living organisms make efficient use of resources, which is key to schools as well. School leaders make decisions on where to assign staff resources and determine facilities and supplies needed for learning.

Innovation. Just as organisms adapt to a changing environment, schools must break free of complacency as the world around them changes. Their long-term adaptability and sustainability depend on taking risks through innovative practices and planning.

The following eight components identify the more specific actions that schools must take to achieve rigor, relevance, and relationships. These eight are not sequential, but all must be addressed if schools are to prepare students adequately for their future. The aspects of the living system model should be reflected upon through each of these components.

1. **Embrace a Common Vision and Goals — Rigor, Relevance, and Relationships for ALL Students.** Schools, like any organization that seeks to improve, must have a common vision shared by all. Everyone must be committed to shared goals to measure success, and staff must have the same perspective as to what is important in the organization.
2. **Inform Decisions Through Data Systems.** Whole school/district reform is a continuous process guided by a well-developed data structures based on multiple measures of student learning. Highly successful schools/districts use quality data to make laser-like decisions about curriculum, instruction, and assessment.
3. **Empower Leadership Teams to Take Action and Innovate.** Schools that will be most successful in the 21st century are led by individuals who possess skills and attitudes to take action rather

Components of School Excellence

For more on the
Components of
School Excellence,
see Chapter 5.

than defend the status quo. Leadership does not reside in a single position, but reflects the attributes, skills, and attitudes of the many staff members who take action and improve through effective learning communities.

4. **Clarify Student Learning Expectations.** Inconsistent state standards, tests, and community expectations create a wide-ranging and jumbled assortment of curricula, instructional practices, and classroom materials, as well as varying expectations for rigor within and across grade levels. When districts take steps to clarify what students are expected to learn, they meet with success in improving student achievement.
5. **Adopt Effective Instructional Practices.** More than high test scores, successful instructional practices include having a wide range of strategies and tools to meet the needs of diverse learners in all disciplines and grade levels. Success in achieving state standards results not from not teaching in routine and proscriptive methods, but from teachers selecting successful instructional practices to meet the needs of all students.
6. **Address Organizational Structures.** Organizational structure should be determined by instructional needs. Only after a comprehensive review of instructional practices should schools begin to address the issues of organization such as school schedules, use of time, unique learning opportunities, school calendars, and physical structure.
7. **Monitor Progress/Improve Support Systems.** Highly successful programs recognize the need to monitor student progress on a regular basis. Successful schools use formative assessments in an organized, deliberate, and ongoing fashion to monitor student progress. Further, they use this data immediately to adjust instructional practices and intervene to meet student needs.

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8. **Refine the Process on an Ongoing Basis.** High-performing schools realize that success is a continuing and ever-changing course of action. This final step should reinvigorate the process and cause school leaders to look at new and emerging challenges and explore potential solutions and successful practices from around the country.

The three major activators that uniquely define the International Center's model of change are (1) aspire for rigor, relevance, and relationships, (2) begin with the end in mind, and (3) consider schools a living system. These form the core of the change model. The next level is a series of *principles of change* that give greater detail to the practices that schools need to focus on to implement desired changes.

Principles of Change

The principles of change can be linked conveniently to all the letters of the alphabet. Here are 13 principles, beginning with the letter D, that provide practical and tactical direction for change in schools.

- Decide with data, not opinions.
- Enlist passionate people.
- Focus on fluency in literacy.
- Grow staff through professional learning.
- Hold teams accountable for learning results.
- Inspire instructional innovation.
- Join with the community in partnerships.
- Know your students, know your strengths, no excuses.
- Live lofty expectations.
- Measure learning by proficiency.
- Nurture positive relationships.
- Offer multiple pathways to achievement.
- Prioritize the curriculum — less is more.

Decide with Data, Not Opinions

True data-driven achievement involves much more than merely reacting to low test scores. The determination of what and how much to teach must be based on data that shows what the world beyond school expects high school graduates to know and be able to do.

Enlist Passionate People

Leadership is key to school success. Leadership is initiated by and modeled after the school principal but is not restricted to a single individual. Successful schools abound with models of distributed and shared leadership. Without passionate people to initiate a change, any change will quickly lose momentum. Jim Collins, in his book *Good to Great*, refers to this act as getting the “right people on the bus.”

Focus on Fluency in Literacy

Literacy is the highest priority in the nation’s most successful schools. All teachers in all disciplines need to teach reading and writing skills that are both rigorous and relevant to the real world. Reading is fundamental and cuts across all learning.

Grow Staff Through Professional Learning

A staff team that functions as a professional learning community comes together for learning within a supportive community. Participants interact, test their ideas, challenge one another’s ideas and interpretations, and process new information gleaned from one

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another. Professional learning must evolve from the occasional burst of energy in a workshop to the multiple forms of ongoing growth and development nurtured in professional learning communities.

Hold Teams Accountable for Learning Results

Good leaders not only set a powerful vision and high expectations, but also follow up to make sure staff implement agreed-upon practices. It is the responsibility of the leader to keep reminding staff of the priority placed upon student learning, to stimulate staff reflection, and to encourage staff to continue to seek new solutions when practices are less than successful.

Good leaders not only set a powerful vision and high expectations, but also follow up to make sure staff implement agreed-upon practices.

Inspire Instructional Innovation

Just as standards and tests do not constitute a curriculum, high-performing schools recognize that curriculum is not instruction. Teachers must personalize learning through instructional strategies and approaches in classrooms that take into account the uniqueness of each student.

Join with the Community in Partnerships

Community or business partners bring many benefits to a school, classroom, and teachers and are critical to effective schools.

Know Your Students, Know Your Strengths, No Excuses

Schools need to find ways to personalize instruction. The first step toward personalization is to fully understand its students' cultures, prior experiences, learning styles, backgrounds, and interests.

Live Lofty Expectations

Schools that establish high expectations for all students — and provide the support necessary to achieve these expectations — have high rates of academic success. High expectations have to be a way of life and drive daily behaviors and actions.

Measure Learning by Proficiency

Many schools need to reexamine grading policies both at the school and classroom levels to ensure that student achievement measures result in students being graded on proficiency rather than seat time.

Many schools need to reexamine grading policies both at the school and classroom levels.

Nurture Positive Relationships

Strong relationships are critical to students completing rigorous work. Students are more likely to make a personal commitment to engage in rigorous learning when they know that teachers, parents, and other students care about how well they do.

There are four dimensions of relationships that are important in schools.

1. **Learning relationships.** These are the relationships with students that are essential for support in the learning process, and are formed from a combination of relationships with parents, peers, and teachers.
2. **Staff relationships.** These are the relationships among teachers, administrators, and support staff that influence teaching, support functions, staff retention and development, and school decisions and problem-solving mechanisms.

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3. **Professional relationships.** These are the relationships that each educator creates and maintains to learn and develop in the profession. Professional relationships comprise individual and group mentors and those who provide a supportive environment in the profession. Professional relationships often extend beyond a school or district where an educator is employed.
4. **Community relationships.** These are the relationships that a school builds with parents and business and community leaders.

Offer Multiple Pathways to Achievement

Rather than holding instructional approaches constant and tolerating different results in student achievement, multiple pathways create different options for students to acquire the same learning.

Teachers need a clear way to help differentiate among curriculum topics that are essential for all students.

Prioritize the Curriculum — Less Is More

When everything is a priority, nothing is a priority. Teachers need a clear way to help differentiate among curriculum topics that are essential for all students and those that are merely nice to know. The International Center's Curriculum Matrix is a resource that can be used as a road map to lead to more targeted instruction and assessment.

Principles of Change

The principles of change can conveniently be linked to all the letters of the alphabet. Each principle is sound advice for creating the schools our children need.

Aspire for rigor, relevance, and relationships.
Begin with the end in mind.
Consider schools living biological systems.
Decide with data.
Enlist passionate people.
Focus on fluency in literacy.
Grow staff through professional learning.
Hold teams accountable for learning results.
Inspire instructional innovation.
Join with community in partnerships.
Know your students, know your strengths, no excuses.
Live lofty expectations.
Measure learning by proficiency.
Nurture positive relationships.
Offer multiple pathways to achievement.
Prioritize the curriculum - less is more.
Question the status quo.
Reflect with resolve current practice.
Scaffold student learning.
Transition students seamlessly.
Use active learning strategies.
Verbalize issues and concerns.
Welcome challenges, complexity, and uncertainty.
eXamine student work.
Yield only to needs of students.
Zero in on best practices from other schools.

Leading Change in High Schools

Successful schools have demonstrated that the best way to develop innovative practices is to involve as many people as possible in formulating education plans. This includes not only administration and staff, but also parents, students, and other members of the community. Consensus building through these constituent groups is not a quick and efficient process. However, it yields a better and more lasting result. Shared decision-making generates a larger pool of ideas and proposals. Once a consensus is reached, the process builds ownership and commitment to ensure those plans are carried out and supported.

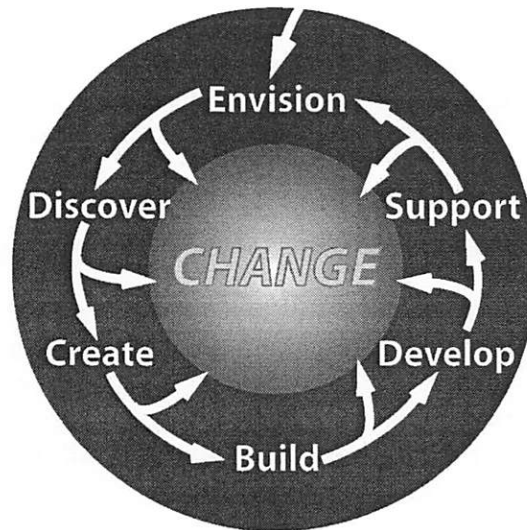
An effective shared decision-making process requires training individuals to both facilitate the process and participate in building consensus. Shared decision making also requires training to focus on the key planning issues. Time should be spent on those decisions which will make a difference rather than focusing on administrative details.

Transformation will only succeed if the people affected by the change feel ownership of the change. People do not always resist change; often, they welcome it. People resist the changes they have no say in or no control over. Change can be a powerful, exciting, and positive experience. The objective is not to figure out how to convince people to accept a change, but to scaffold the change process in such a way that people can feel part of the process and influence the result. In practice, there is too little time and too many people to involve everyone completely in every decision. The key is to recognize that for change to be implemented effectively the people involved must be part of the process.

Planned change in an organization results from a constant flow of activities, as represented in the process of change model.

Strategies to Empower the Process of Change

There is no such
thing as a problem-
free change.



More information and activities on the process of change can be found in the International Center resource kit, *Leadership for Rigor, Relevance, and Relationships*.

The six phases in this model are:

- envision
- discover
- create
- build
- develop
- support

The phases represent types of strategies that are effective in working with people to change organizations. Creating change is not a linear process; it is a constant cycle of interventions and activities. Change is influenced by the way people work together in each of the phases, which now will be discussed in further detail.

Leading Change in High Schools

Envision — Dream the Possible

By envisioning, people come to believe that things can be different. They can imagine what it would be like to have problems solved, processes run more smoothly, and outcomes be more successful.

Discover — Focus on Competence of the Organization

Discovery involves posing questions to help people reflect on the positive aspects of the organization related to the vision. Instead of starting with a deficit model or negative talk about what is wrong, start with a close look at strengths. Reflecting on success stories and posing “what if” scenarios can help the staff discover what is possible in organizational change.

Create — Design Solutions Through Kaleidoscope Thinking

Creating requires getting people to think in innovative ways by considering as many different ideas and perspectives as possible. The purpose of this strategy is to expand people’s perspectives and generate novel and unique solutions to problems. Divergent thinking is healthy and should be deliberately planned.

Build — Forge a Consensus for Change

Building is somewhat the opposite of creating. Here, the purpose is to get people thinking alike by building consensus. In this strategy, it is important to develop plans and activities to achieve a common vision. Enough details must be in place to determine the resources necessary to start implementation, but it is good for some details to be left out. This provides the opportunity to engage more people in defining the specifics.

Develop — Cultivate the Growth of People

Change will not succeed unless people develop the skills necessary to understand change. This strategy also refers to communication building. People will participate more actively and learn more if they understand the nature of the change. This strategy is not about formal professional development workshops, although they may be useful. It is about setting a climate in which staff have rich opportunities to learn and share experiences. People must feel free to take risks and try new things. In this type of environment, staff will grow and develop.

Support — Sustain People Through Implementation

Support is the most neglected strategy, and this neglect often limits the impact of a change. Most people are tentative in the decision to make a substantial change. To be sure that implementation continues, people in the organization who are struggling to adopt the change need follow-up and coaching. Rewards and recognition are extremely valuable in reinforcing the change and making people feel good about it. Financial resources must not be forgotten when providing assistance for change. Too many good ideas have been labeled as ineffective because there was inadequate support for implementing the change.

Each of the six strategies is critical to organizational change. They apply to many aspects of education, from changes in teaching and learning to building a new school. There is a logical order to the phases. However, things rarely go smoothly in the real world. Often, organizations must revisit a phase to correct a weakness. For example, if staff become confused about the change, more attention should be paid to discovery to refocus on the positive aspects of the school. Sometimes, feedback indicates that some

Leading Change in High Schools

part of the change is not working. It is then necessary to return to creating and brainstorming to figure out how to improve that specific aspect of the change.

If any one of these phases is not carried out effectively, problems will arise. Leaders must be able to sense where people in the organization are and what their needs are. Leaders must focus on the correct strategy for working with people and select the right tool. There are many techniques for working with individuals and groups in each of the phases. Leaders should adjust their style and activities depending on the strategy. The following table includes key considerations for each phase.

Key Pointers for Process of Change
Envision ✿ Focus on the future. ✿ Do not lay blame. ✿ Paint mental pictures. ✿ Use metaphors. ✿ Be enthusiastic. ✿ Keep the message simple. ✿ Repeat, repeat, repeat.
Discover ✿ Focus on the positive. ✿ Reflect on what works well. ✿ Develop mental images of high performance. ✿ Ask "what if" questions. ✿ Tell success stories about personal development. ✿ Focus on and work from what is known.
Create ✿ Encourage divergent thinking. ✿ Build trust. ✿ Provide extensive information. ✿ Use brainstorming. ✿ Allow open participation. ✿ Recognize that it is okay to feel uncomfortable.

The best way to cope with change is to create it.

Build

- ✳ Encourage convergent thinking.
- ✳ Give adequate lead time.
- ✳ Use consensus decision-making.
- ✳ Provide "situational leadership."
- ✳ Be empathetic to human needs.

Develop

- ✳ Use outside people to start.
- ✳ Use inside people to carry out.
- ✳ Provide "just-in-time" development.
- ✳ Encourage and support personal development.
- ✳ Use skilled communicators.
- ✳ Keep communication simple.
- ✳ Get verbal commitment to change.

Support

- ✳ Provide adequate resources.
- ✳ Give recognition and rewards.
- ✳ Evaluate and revise.
- ✳ Consider individual differences.
- ✳ Provide follow-up.
- ✳ Expect results and inspect progress.

The Right Action at the Right Time

There is a time and place for everything. One way to be an effective agent of change is to take the right action at the right time. The right action, of course, depends on the symptoms of your organization and the phase of change process. The following chart shows negative characteristics that indicate a weakness in making a successful change. Opposite each set of symptoms is the strategy that should be used.

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Symptoms If people are/have ...	Phase to focus on ...
Apathetic, uncommitted	Envision
Unproductive, low morale	Discover
Committed to status quo, tunnel vision	Create
Confused, in conflict, anxious	Build
Fearful, frustrated, lacking confidence	Develop
Tentative, slow implementers, discouraged	Support

Ayres, A. and P. Oldenburg. (Eds.). *India Briefing, Takeoff at Last?* Asia Society, 2005

Bails, J. "No Longer Lost in Translation." *Pittsburgh Tribune-Review*, Oct. 28, 2005

Bonsor, K. "How DNA Computers Will Work." www.HowStuffWorks.com

Brain, M. "How Motes Work." HowStuffWorks.com

References and Resources

Chapter 3 Why Change and How to Do It

Daly, J. "Risky Business." Digital Divide Network Web site. George Lucas Educational Foundation, 2006:

www.digitaldivide.net/articles/view.php?ArticleID=572#top

Engardio, P. "A New World Economy." *Business Week*, Aug. 22-29, 2005

Farivar, C. "Cars Chat and Park Themselves." *Wired News*, Nov. 9, 2005

Fishman, T. C. *China, Inc.* New York: Scribner, 2005

Friedman, T. L. *The World Is Flat*. New York: Farrar, Straus and Giroux, 2005

Hoff, D. J. "States Facing Fiscal Strain of Pensions." *Education Week*, May 18, 2005

Kho, J. "Cars May Find Parking Spots." *Red Herring*, Nov. 5, 2005

Kristof, N. and S. Wudunn. *China Wakes*. Vintage Books, 1995

Mahapatra, R. "Microsoft to Invest in India, Add Jobs." Associated Press, Dec. 7, 2005

MIT News. "MIT Material Stops Bleeding in Seconds." Retrieved April 26, 2008: <http://web.mit.edu/newsoffice/2006/hemostasis.html>

National Cancer Institute. "Implantable Microfluidic Device Could Detect Cancer Markers." Retrieved April 26, 2008 from http://nano.cancer.gov/news_center/2007/oct/nanotech_news_2007-10-31c.asp

Leading Change in High Schools

Physorg.com. "Nanodevices Can 'Hear' Cancer." Retrieved online April 26, 2008 from www.physorg.com/news7980.html

Prensky, M. "Listen to the Natives." *Educational Leadership*, December/January 2005/2006

Sahadi, J. "Social Security, Medicare to Run out Sooner." *CNNMoney.com*, May 3, 2006

Spinks, S. "Inside the Teenage Brain." *Frontline* Interview: Deborah Yurgelun-Todd." *Frontline*: January 2002. Retrieved May 1, 2006: www.pbs.org/wgbh/pages/frontline/shows/teenbrain/interviews/todd.html

Spinks, S. "Inside the Teenage Brain." *Frontline* Interview: Jay Giedd, January 2002. Retrieved May 1, 2006: www.pbs.org/wgbhpages/frontline/shows/teenbrain/interviews/giedd.html

Sylwester, R. "The Tween Brain: Midway Between Infant Dependency and Adult Autonomy: Part 1." *BrainConnections* Web site, March 2006. Retrieved April 24, 2006: www.brainconnection.com/content/228_3

Sylwester, R. "The Tween Brain: Midway Between Infant Dependency and Adult Autonomy: Part 2." *BrainConnections* Web site, April 2006. Retrieved April 24, 2006: www.brainconnection.com/content/229_1/printable
Technology Review. "10 Emerging Technologies." February 2003

Technology Review. "10 Emerging Technologies." May 2005

Chapter 3 Why Change and How to Do It

Thielfoldt, D. and D. Scheef. "Generation X and the Millennials: What You Need to Know About Mentoring the New Generation." *Law Practice Today*, Aug. 2004. www.abanet.org/lpm/lpt/articles/mgt08044.html

Wade, N. "Scan Shows Different Growth for Intelligent Brains." Brain Research Institute, UCLA, March 2006. Retrieved April 25, 2006: www.bri_weekly/news_060330.asp

Wikipedia. "Generation Z." Retrieved April 28, 2006: www.en.wikipedia.org/wiki/Generation_Z

Wikipedia. "Mechatronics." www.en.wikipedia.org/wiki/Mechatronics

World Community Grid Web site. www.worldcommunitygrid.org

Wolf, R. "As Social Security Surges and Medicare Takes Off, the Deficit Will Soar. The result: 'Fiscal Hurricane.'" *USA Today*, Nov. 25, 2005

Wolf, R. "More Patients Fall Into a Hole in Drug Benefit." *USA Today*, July 28, 2006



Chapter 4



Principles of Change — Practitioner Perspectives

Introduction

The articles provide a wealth of ideas and practical advice.

This chapter is a collection of articles written by school practitioners. The authors, current or recently retired administrators who have worked extensively in schools, were invited to share their stories and suggestions because of their experience in the education field.

The articles are organized under the 13 principles of change described in Chapter 3. These principles are the themes that run through all improvement efforts. By keeping these principles in mind, school leaders can make positive changes in secondary schools. Here are the 13 principles listed again:

- Decide with data.
- Enlist passionate people.
- Focus on fluency in literacy.
- Grow staff through professional learning.
- Hold teams accountable for learning results.
- Inspire instructional innovation.
- Join with community in partnerships.
- Know your students, know your strengths, no excuses.
- Live lofty expectations.
- Measure learning by proficiency.
- Nurture positive relationships.
- Offer multiple pathways to achievement.
- Prioritize the curriculum — less is more.

The articles provide a wealth of ideas and practical advice in working within school communities. There are many ways educators can use these documents, from sharing individual stories with colleagues as conversation starters to incorporating them in professional development programs.

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When I first became a school leader in a large suburban high school, I was overwhelmed with the notion of maximizing operational efficiency and student achievement. I knew that moving from the role of a classroom teacher to school administration would require that I equip myself with skills to oversee and effect change in areas such as facilities, security, transportation, and student services. However, considering myself an effective classroom teacher in all levels of mathematics and science, I incorrectly assumed that the instructional leadership role would not require as much of a learning curve. However, I found that, in contrast to elementary teachers who are responsible for the delivery of the majority of the curriculum to the students, I was a high school math and science teacher, an isolated specialist who rarely ventured into the world of other disciplines.

As a new administrator, I was given the challenge to develop, implement, and supervise the school's literacy plan, as well as oversee the English and reading departments. In a state of accountability and school sanctions for poor performance, I knew that I needed to learn quickly and gain enough credibility with the teachers to be able to effect positive change.

What Do I Work on First?

Every person in the school building and member of the school's stakeholder group has a different opinion of what needs to be "fixed" in a school and its relative priority to other things. Teachers will say they cannot teach students who are not in school, so the attendance must be addressed. Others will say that too many students are dropping out and not graduating. Parents will lament that the age of accountability has diminished the opportunities for their child to engage in honors courses, the arts, and career and technical education (CTE). Supervisors, parents, and the

Decide with Data

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community at large look to the state-mandated test scores and want improved performance. Security personnel sigh when you mention student character, and student engagement in school including extracurricular activities tops many lists of school ailments.

Naturally, the answer to the question “What do I work on first?” will be decided upon by the school’s leadership team using not only data, but also the school’s mission and vision as guides. The data will provide a clear lens through which to view the realities associated with the opinions and determine just how wide the gaps are between where the school is and where it needs to be.

Data Collection

Some schools have access to extremely sophisticated district-based data collection and reporting tools, such as those available to me in Broward County, Florida, my home district. Other school districts have minimal districtwide collection and reporting tools, leaving those functions to individual schools with variable staff capacity for the development and implementation of these technology-based systems. Whether the district is collecting data for the schools or the schools are collecting their own data, an important consideration is that the data needs to remain in a medium that allows for future manipulation. The beauty of collecting data is that it can be utilized to answer a variety of questions, even those questions that you had not thought about until you began to look at and manipulate the information.

I participated in a daylong seminar with a colleague some time ago, and he told a story about going to a neighbor’s home for dinner one evening that put data collection into perspective. Upon entering the home, he saw a wall filled with pictures of every house in the neighborhood, along with information attached to each picture. The

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information included such things as sales price, date of purchase, and square footage. My colleague, Steve, asked his neighbor which spouse is a real estate agent or involved in real estate investment ventures. The neighbor replied, "Neither of us." Steve asked, "Are you planning on moving?" The neighbor replied, "No, we love it here". Confused, Steve asked, "Then why all of the pictures and information?" The neighbor said, "We just like collecting data."

The fundamental questions are: What does the data really say, and how can you use the data to close the gap between reality and the desired goal?

Many of the approaches to data collection in schools today are more akin to the filled walls of the home of Steve's neighbor than to fueling sustainable school improvement. Schools collect state assessment data that includes diagnostic tests for skills such as fluency, comprehension, and vocabulary; course grades; and student retention. Even the numbers of students eating breakfast are captured. The fundamental questions are: What does the data really say, and how can you use the data to close the gap between reality and the desired goal?

Using the Data: A Prescription for Success

The use of data brings me full circle to the opening paragraphs of this article. Secondary school leaders generally received formalized training in one or two disciplines, but they are now charged with the instructional leadership of the entire curricular array of the school. Not only are they faced with the challenges of collecting data, but also organizing it into a useable format so that teachers and other educators can utilize the information to make decisions to maximize student learning, opportunities, and safety.

The first year I was the supervising administrator for the English and reading departments and responsible for the schoolwide literacy plan was a defining moment in my career as a school leader. I could

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gather student assessment data and even do a level-one analysis of the information for the teachers, identifying for them students' relative strengths and weaknesses. However, I was completely reliant upon the teachers to act upon this information as "the experts." I quickly realized that while the math teachers were able to effectively utilize math scores on state assessments to make methodological and programmatic changes, high school teachers were not trained to address the needs of adolescent struggling readers. What I saw in the teachers' faces when I would present them with aesthetically pleasing, well-compiled packets of student data was completely blank stares. I knew that this was not the answer to improving student achievement.

I knew that in order to effect any sustainable change, I had to provide teachers with immediate resources with which to modify their instruction to meet student needs, while continuing to provide staff development to maximize their capacity. I decided that by using the power of computer programming, I could in a meaningful manner add to the data reports. Not only would teachers have their student achievement data available, but also the programming could identify for them the greatest deficiencies on a class level. Additionally, the analysis of deficiencies could generate a list of teacher resources to effectively address these students' needs. The list of resources, which became known as the "Prescription for Success," included skill-specific question stems that could be integrated into daily lessons and assessments; descriptions of suggested teaching strategies including Marzano's High Yield Strategies; and school-based and state-based resources that teachers could access to supplement their curriculum with both remediation and enrichment activities. A sample student data report follows.

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Sample Student Data Report

Period 01	Teacher:	Test Data				
Student Name	Grade Level	Comparison	Main Idea	Reference and Research	Words	Total
THESE STUDENTS ARE IN THE LOWEST 30%						
Student A	9	4 OF 11	5 of 16	2 of 9	5 of 9	16 of 45
Student B	10	2 OF 11	4 of 16	2 of 9	2 of 9	10 of 45
Student C	10	3 OF 11	11 of 16	4 of 9	2 of 9	20 of 45
Student D	10	0 OF 11	9 of 16	1 of 9	2 of 9	12 of 45
Student E	10	7 OF 11	5 of 16	4 of 9	4 of 9	20 of 45
Student F	10	3 OF 11	8 of 16	2 of 9	1 of 9	14 of 45
Student G	10	4 OF 11	6 of 16	5 of 9	3 of 9	18 of 45
Student H	10	5 OF 11	6 of 16	1 of 9	3 of 9	15 of 45
THESE STUDENTS ARE NOT IN THE LOWEST 30%						
Student I	10	5 OF 11	7 of 16	3 of 9	7 of 9	22 of 45
Student J	10	7 OF 11	7 of 16	2 of 9	6 of 9	22 of 45
Student K	10	5 OF 11	11 of 16	2 of 9	7 of 9	25 of 45
Student L	10	7 OF 11	14 of 16	3 of 9	3 of 9	27 of 45
Student M	10	4 OF 11	11 of 16	4 of 9	9 of 9	28 of 45
Student N	9	11 OF 11	16 of 16	8 of 9	9 of 9	44 of 45
Student O	10	5 OF 11	8 of 16	4 of 9	4 of 9	21 of 45
Student P	10	8 OF 11	10 of 16	5 of 9	6 of 9	29 of 45
Student Q	10	2 OF 11	10 of 16	3 of 9	6 of 9	21 of 45
Student R	10	8 OF 11	11 of 16	4 of 9	5 of 9	28 of 45
Student S	10	4 OF 11	8 of 16	6 of 9	8 of 9	26 of 45
Student T	10	5 OF 11	9 of 16	6 of 9	6 of 9	26 of 45
Student U	10	9 OF 11	14 of 16	7 of 9	7 of 9	37 of 45
Student V	9	7 OF 11	13 of 16	3 of 9	6 of 9	29 of 45
Student W	10	8 OF 11	12 of 16	8 of 9	7 of 9	35 of 45
Student X	10	4 OF 11	12 of 16	3 of 9	4 of 9	23 of 45
Student Y	10	6 OF 11	8 of 16	4 of 9	6 of 9	24 of 45
Student Z	10	9 OF 11	12 of 16	4 of 9	6 of 9	31 of 45
Averages for Class						
Comparison		Main Idea		Research & Reference		Words
5.46 of 11	49.65%	9.50 of 16	59.38%	3.85 of 9	42.74%	5.15 of 9
						57.26%

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Teacher Prescription for Success

Teacher Resources for Student Success

- All questions can be used as either multiple choice or short answer and extended response.
 - Short and extended response answers are to be supported with relevant details, facts, statistics, or other information from the text.
1. Your students are exhibiting the greatest weakness with REF RESEARCH.
 2. The following question stems can be used in your daily lessons to strengthen this cluster.

Gathering, Analyzing, Evaluating Information

- What can the reader predict / infer from ____?
- What might happen if ____?
- What evidence supports the conclusion that ____?
- According to Figures 1 and 2, ____?
- How does the subheading / section entitled ____ help the reader to understand ____?
- What evidence in the article suggests ____?
- The idea that ____ is supported by ____?
- Why is ____ significant to the conclusion of the passage?
- Using both the article and the illustration ____?
- Using both articles, what are the major differences between ____ and ____?

Short Response / Extended Response

- What steps should you take if ____? Use details and information from the article to support your answer.
- What are the major differences between ____ and ____? Use info from BOTH the article “____” AND the photos to support your answer.

Analyzing primary source information

- According to the evidence in the article about ____, which ____ contributed most to ____?
- What does the author use to support the points he/she makes about ____?
- At the end of the essay, the author compares ____ to a _____. To which kinds of ____ would he most likely compare ____?

Short Response / Extended Response

- The author appears qualified to claim that ____ because he / she....
- What evidence in these articles suggests that ____? Use specific information from the articles to support your answer.

Synthesizing information & conclusions

- Refer to the articles on ____ and ____ to answer the following two questions.
- What did both ____ and ____ do during the course of ____?
- What idea made it difficult for ____ to ____?

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One Step Further: Prescribing Student Success

Providing a mechanism for teachers to not only understand data, but that also included easy-to-implement programmatic and methodological changes to accompany the data based upon student needs was a major accomplishment. However, as I engaged in high school reform training such as through the National Association of Secondary School Principals, as well as using the International Center's education resource kit, *Leadership for Rigor, Relevance, and Relationships*, a recurring theme of personalization and student independence prompted my thoughts to turn directly to the students. As a result, our high school created a report to capture student progress toward mastery of state benchmarks. The report not only includes student data, but also sets goals for the students. Specific features of the report that are invisible to the students indicate to the teacher that the student is a member of a specific at-risk group. A computer software program used for the report helps to identify strengths and weaknesses and provides a "prescription for success" to the student. This prescription is based on the student's needs and includes school resources, as well as state and community resources to address the deficiencies. The report is generated and distributed three times a year. The first of a set of three reports follows.

Providing a mechanism for teachers to not only understand data, but that also included easy-to-implement programmatic and methodological changes to accompany the data based upon student needs was a major accomplishment.

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Student Prescription for Success

Literacy:

You are exhibiting the greatest strength in the area of main idea.

You are exhibiting the greatest difficulty with the standards within words and phrases in context.

You will participate in writing assignments in class. Your English teacher will place special emphasis on focus, organization, support, and conventions.

Numeracy:

You are exhibiting the greatest strength in the area of geometry.

You are exhibiting the greatest difficulty with the standards within number sense.

Resources:

The National Honor Society offers free tutoring every Monday and Thursday after school. See Ms. Duarte or your guidance counselor to sign up.

You will participate in reading assignments weekly in each of your classes.

You are enrolled in an Intensive Reading course to further support your preparation for the Reading FCAT and achievement in reading.

Please visit www.fcatexplorer.com for additional assistance. Directions for login can be found in the media center and will be distributed by your English teacher.

A FCAT Simulation CD will be distributed along with report cards on Wednesday, November 14. You can access this program at anytime in the media center.

The media center is open Monday -Thursday until 5:30 p.m. for students to use as a resource to facilitate the completion of homework and class projects.

11th and 12th grade students who have not successfully completed the FCAT reading or math requirements can sign up for a FCAT/ACT prep course. Please see your guidance counselor for details.

A booklet outlining additional resources is available on the school Web page - www.southplantationhigh.net

Students and parents can make an appointment to see a guidance counselor by visiting the office before schools, after school, during lunch, or by calling 555-555-1111.

FCAT Boot Camp will be available from January 14 - February 14 in writing, reading, and math to further support your preparation for the FCAT exam.

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Moving Beyond State-Mandated Testing

Poor performance on state-mandated testing is a manifestation of a host of other ailments that plague a school. In any school, it is important that students encounter high and consistent expectations for student performance. It is important that teachers begin with the end in mind and have defined clearly what it is that students should be able to know and do at the end of the unit and how it applies to today's world. There must be a sense of safety and orderliness within a school building for effective teaching and learning to take place. Teachers must develop an attitude that it is unacceptable for a student to fail a course and provide students with every opportunity to succeed, including increasing their learning time and valuing mastery over seat time or discreet assignments. Moreover, the school's leadership team must operate as true instructional leaders, assisting and supporting teachers in the transition from 20th century schooling to 21st century learning.

Poor performance on state-mandated testing is a manifestation of a host of other ailments that plague a school.

There is data at your school available to answer all of these concerns. However, as a school leader, you must understand the parameters that influence the data and truly understand under what conditions you can compare data sets. Are the teachers assessing the students in a similar manner? Are multiple class sections of the same subject covering equivalent concepts at the same time? Is teacher attendance playing a role in your students' achievement? Sometimes, the best thing about data is that it allows us to ask questions that we might not have thought about.

To effectively make decisions in a school based upon data and not opinions, schools must maintain longitudinal data. This means that data needs to include not only state-mandated testing and reading/math diagnostics, but also as many of the other factors that affect student achievement as possible. These may include attendance rates, retention rates, data on disciplinary measures, and demographics such as free- and reduced-price lunch population,

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students with disabilities, and English language learners. Other factors may include hours of participation in community service, measures of parent involvement, and technology proficiency.

Learning Criteria to Support 21st Century Learners

One of the most powerful tools for deciding with data and not opinions that I have encountered as a school leader is the International Center's Learning Criteria to Support 21st Century Learners.

One of the most powerful tools for deciding with data and not opinions that I have encountered as a school leader is the International Center's Learning Criteria to Support 21st Century Learners.TM The Learning Criteria directs the school leadership team to identify the items, in four categories, that would indicate success with students. The four categories are Core Learning, Stretch Learning, Learner Engagement, and Personal Skill Development.

While the core learning category includes those things such as state-mandated testing and course grades, which are generally tracked in schools, the other three categories open the door for conversations about the whole student. The discussions that preceded the decision of what data elements would constitute success in stretch learning, for example, sparked many debates among our faculty about what we consider stretch learning to mean or to what or whom it should apply. Some teachers said that stretch learning applied only to honors, Advanced Placement, and dual-enrollment courses. On the other hand, the CTE teachers identified their certification programs as stretch learning. The teachers of students with special needs identified the gainful employment of students as evidence that stretch learning was occurring. All of these interpretations were correct and provided a medium for rich conversation about individualized student learning and respecting student differences.

When teachers hear the words “student engagement,” they tend to immediately think of teacher observation and evaluation instruments that measure the number of students “engaged” in the classroom. When the leadership team began to define student engagement

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in terms of attendance rates and participation in extracurricular activities, the conversations changed dramatically. Suddenly, teachers internalized the importance of providing activities for all students and understood the intrinsic value in volunteering their time to provide these opportunities for students.

As far as data elements that could be used within a school to provide some measure of student character as part of personal skill development criterion, there were teachers who firmly believed that the development of student character was the sole responsibility of the family and society outside of the school. Others spoke about broken homes, foster children, and the down-trodden and espoused a solid social justice stance. As a school leader, you must realize that what began as a benign conversation about “data” is really fundamentally about people and their values.

As a school leader, you must realize that what began as a benign conversation about “data” is really fundamentally about people and their values.

Opinions Muddy the Water

The infusion of beliefs and values into the discussion of data has been one of the most difficult concepts for me to learn. In the engineering world, there are constants and the behavior of inanimate objects is fairly predictable once certain data elements are collected. The discussion of data in the field of engineering rarely involves decision making based solely upon beliefs and values. In education, you come to realize that while you can increase the probability of certain outcomes through the study of data and implementation of changes, you are dealing with unpredictable human beings. Their differences in prior life experiences, values, and ideas about the purposes of education will attempt to steer all decisions to fit with their opinion of how things should be. As a school leader, you must practice self-awareness of your own values and beliefs and allow the data to speak for itself to effect change that is in the best interest of students.

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As a school leader, you must practice self-awareness of your own values and beliefs and allow the data to speak for itself to effect change that is in the best interest of students.

Points to Consider

- Data will provide leaders the ability to help teachers understand how to address student needs.
- Data will provide focus for decision making.
- Stamp collection and data collection are two very different things.
- Once collected, data must remain in a form that is easily manipulated.
- As questions are being answered through the data process, other questions will arise.
- Providing teachers, students, and parents with data is not enough. You must be able to explain it to them in layman's terms and provide resources that will assist them in the pursuit of self-remediation.
- Pay attention to a variety of things within your school – beyond state assessment data. Sometimes, attention to other indicators will resolve more than one problem.
- Be cognizant that, while the data may be just numbers, discussions based on data are about people's values.

Enlist Passionate People

Kathleen Weigel

Dr. Kathleen Weigel is Principal at Atlantic Community High School in Delray Beach, Florida.

Passion is a simple term that describes complex behavior and is a powerful and important force in the process of school change. In our lives, we know what passion feels like and looks like. It is an intense emotion, an overpowering feeling – love and joy, hatred and anger. It's the excitement and the burst of energy that we get from the things we enjoy doing in our lives. Passion is contagious — we are affected by it. We see and feel it in others.

It is passion, the intense emotion which drives our love for our students and a keen interest in others, that powers our profession. Schools are not collections of isolated individuals. They are communities of students, staff, and parents. Passion is the common emotion that propels us to reach our common goals. The more passion in our work, the more effective our work!

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According to Dr. John Pisapia, Professor of Leadership and Policy at Florida Atlantic University in Boca Raton and the founder of Strategic Leadership International, effective leaders do the four Ls — listen, learn, look, and then leap. While you are doing the leaping, people are absolutely intense about what you do and what they do. This is when passion is clearly evident. It's that coach that feels that surge of energy when a team is playing a sport or when you walk into a classroom and you see the energy and excitement in the teacher's lesson or the student's response. That is passion. It is energy that drives us to peak performance.

Finding Passionate People

Experiencing passion in a school staff begins with finding the right people who are capable of showing deep emotion for the challenging work of educating students. The interview team must find people who have an intenseness about the success of children in whatever form that takes. Then is it the leader's job to talk to the selected candidate about specifically how to do things better, smarter, and faster in making education more rigorous and relevant for students. The leader also should focus on what kind of relationship-building skills job candidates have to bring to the table.

Passion in Leadership Teams

To facilitate change in my school, we have a number of leadership teams. We have a traditional administrative leadership team that consists of assistant principals, school police, ESL coordinators, ESE coordinators, career coordinators, a security chief, and a ROTC

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commander. Conversations at the table initially focus on routine administrative matters. However, once we start talking about how we can do things better for students, passion inevitably emerges.

A second leadership team consists of the instructional leaders, who were former department chairs. These leaders don't manage textbooks anymore. Their passion is found in the classroom. Not only do they drive the curriculum and help teachers who need it, but they also are in classrooms during planning periods, approaching new teachers and guiding instruction. They are in learning team meetings with each other, talking about how to do things better for students through analyzing data, improving instructional strategies, and discussing rigor and relevance in pursuit of finding excellent Quadrant D activities.

Another group consists of team leaders who oversee the 9th and 10th grade academies. These leaders are in charge of the four core teachers plus a reading teacher. They meet regularly to talk about how to reach each student to improve behavior and, more important, how to engage the student instructionally.

We also have a voluntary curriculum team. It consists of the instructional leaders and any teachers who are interested in improving and enhancing the curriculum. During these meetings, best instructional strategies are shared with energy and enthusiasm.

In addition, we have learning team meetings with a facilitator during teacher planning time in which staff talk about assessments used to drive instruction in the same direction. Questions that staff focus on include: Are our tests valid? What should they look like? Are the tests measuring the correct proficiency level? Are we on the same page? Participants also organize into curricular groups.

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Finally, we have a transition team, which is our most innovative restructuring group. This team has been called the Daggett Team because we used the tenets of Dr. Willard Daggett to implement the goal of rigor and relevance for all students. The team consists of key people on the staff who have a real need and passion to move this school forward. It includes the ELL coordinator, ESE coordinator, ROTC coordinator, director of guidance, career coordinator, and one assistant principal. They do the budget, the master schedule, and all other duties that move the school forward. Their conversations were critical for change — driven again by their passion for improving the school. Passion was the essential ingredient that made this team successful. Staff never would have committed the required time and effort without passion. They drove each other to do more.

Passion was the essential ingredient that made this team successful. Staff never would have committed the required time and effort without passion. They drove each other to do more.

Out of the transition team came the mantras: Failure is not an option. We accelerate — we don't remediate. All children are gifted, and we need to unlock the gift. These are three very powerful beliefs with which the team totally restructured a traditional high school based around the International Baccalaureate (IB) program to 9th grade academies, 10th grade academies and wall-to-wall academies that have made the students interested, kept them in school and helped them remain academically successful.

Characteristics of Typical Staff

Not all people are passionate about school improvement and renewal. According to the National Standards and Business Practices, 15% of the U.S. workforce are innovators, or the "racehorses." It's the passion that allows this 15% to drive change and motivate others to follow.

Seventy percent of the workforce are the "plow horses." They are the ones who work toward the weekends. They do a mediocre

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job, punch the clock, put in their time, and go home. They may not show passion, but this group can be led by passionate leaders. The last 15% are the “dead horses,” or the people who are “retired-in-residence.” They typically do a less-than-marginal job. Their passion is dead.

I’ve found that the first thing on the minds of the top 15%, the racehorses, is the following question. How is this change or initiative going to affect students? On the other hand, the lower 15% are concerned mainly with how will change affect them as individuals with little regard for how change will affect the school as a whole.

I tried for 30 years to reignite that bottom 15% without much success. No matter what effort, I could barely move even three or four of them. Even when some showed some progress, as soon as I would turn my back, they’d slip into to old behaviors. Sometimes they aren’t just retired-in-residence; they are also the ones who will try to subvert your work. You have to know that this exists. It is your job as an administrator to move these people out of the school.

Nurturing Passion in People

The leader’s job is to instill passion in people, to push them into the light. Having a lot of conversations, encouraging staff and colleagues, and having an open-door policy are all part of building a culture driven by passion. You have to draw attention to the issues and try not be the administrator who automatically solves every problem. It’s a good idea to solve the routine problems in the school — the angry parent and facility issues — but leave the instructional and school performance problems to staff, who are more likely to gain passion through wrestling with problems and discovering possibilities on their own and through teamwork with one another.

Leading Change in High Schools

Spreading passion should be a conscious effort. As an administrative leader, one should avoid staying in the office. Visibility is key. You have to be out in the hallway and in the classrooms and have your office door open. Teachers should do the same for students. To generate passion in students, they should be allowed to partake in discussions that deal with instructional strategies and learning abilities.

Having a lot of conversations, encouraging staff and colleagues, and having an open-door policy are all part of building a culture driven by passion.

Strive for Diversity

We need to make a conscious effort to celebrate differences and explore similarities in areas of gender, ethnicity, and life experiences. A diverse environment of opinions, perspective, and creativity adds to the culture and vision of the school.

Recognition Increases Passion

Give recognition any place you can. Acknowledge people in newsletters, on the marquis, during faculty meetings, to the district, over the public address system, in personal notes, or during community luncheons. Sometimes offering a face-to-face compliment to a staff member is all it takes to raise the level of passion in his or her work.

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Focus on Fluency in Literacy

*Susan E.
Szachowicz*

Dr. Susan E. Szachowicz is Principal of Brockton High School in Brockton, Massachusetts.

A schoolwide literacy initiative has been the most important factor in the academic success story of Brockton High School, a large (4,400 students) urban high school in Massachusetts with a diverse student population racially, ethnically, and socioeconomically. Despite challenging demographics, Brockton High has transformed itself from an underperforming school into a model of student achievement, garnering awards and recognition at the state and national levels because of this literacy initiative.

When the state first instituted its high-stakes assessment, the Massachusetts Comprehensive Assessment System (MCAS), our high school's scores were dismal. In English language arts, 44% of the students failed and only 22% reached proficiency. In math, the story was even more disheartening. Of the students, 76% failed the math MCAS, and only 7% reached proficiency.

Eight years later, the statistics told a very different story. Brockton High reduced its failure rate by 37%, from 44% to only 7%, and dramatically increased the percentage of students reaching proficiency by 47%, from 22% to 69%. In math, the results also were impressive. The failure rate was reduced by an amazing 57%, from 76% to 19%, and the percentage of students reaching proficiency has increased by 45%, from 7% to 52%.

In Massachusetts, a student must pass the MCAS to earn a diploma; there are NO exemptions. At Brockton High the minority population is about 68%, more than one-third of the students do not speak English as their first language, and poverty is high. Still, expectations for all students are high. Although many initiatives and reform efforts have contributed to Brockton High School's turnaround, the most important has been organizing the entire school around clearly defined literacy skills – every faculty member in every discipline is responsible for teaching these literacy skills to every student.

Leading Change in High Schools

The Role of the Restructuring Committee: Our “Think Tank”

The initial sense of shock and deep disappointment with the MCAS scores were replaced by a commitment among many faculty and administrators to look in the mirror and make substantive changes in the school, particularly with curriculum and instruction. The Restructuring Committee, a group of 32 teachers and administrators who represented every department in the school, examined the MCAS data and determined that we needed a total school focus. It is important to note that this Restructuring Committee, essentially a “think tank” for school improvement, is a paid committee funded by local professional development dollars. The superintendent sets aside funds called “Challenge for Change” grants for which any principal can apply. Brockton High uses the grant money to fund the Restructuring Committee. Teachers on the Restructuring Committee are paid an hourly rate and meet at least once a month on Saturdays. Because the Restructuring Committee includes administrators and teachers and every content discipline in the school has representation, it is a powerful group that has become the voice for change and school improvement.

Defining Literacy

Based upon the state standards and what teachers felt students needed to be able to demonstrate success not only on the MCAS, but also in preparation for college or a career, the Restructuring Committee defined literacy in four areas: reading, writing, speaking, and reasoning (see the literacy charts beginning on Page 158). This was no easy task. This definition of literacy had to be clear, concise and, most importantly, make sense to teachers in every discipline. It was crucial that these literacy skills apply across disciplines and

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every teacher needed to see these skills as necessary for their students to be successful. As illustrated in each of the following charts, the literacy skill (reading, writing, speaking, or reasoning) is in the center; the content area disciplines support the skill. This was a dramatic change. Brockton High was a traditional comprehensive high school with clearly defined departments and very little cross-disciplinary instruction or learning. To link the school through literacy skills would mark a dramatic change in the culture of the school.

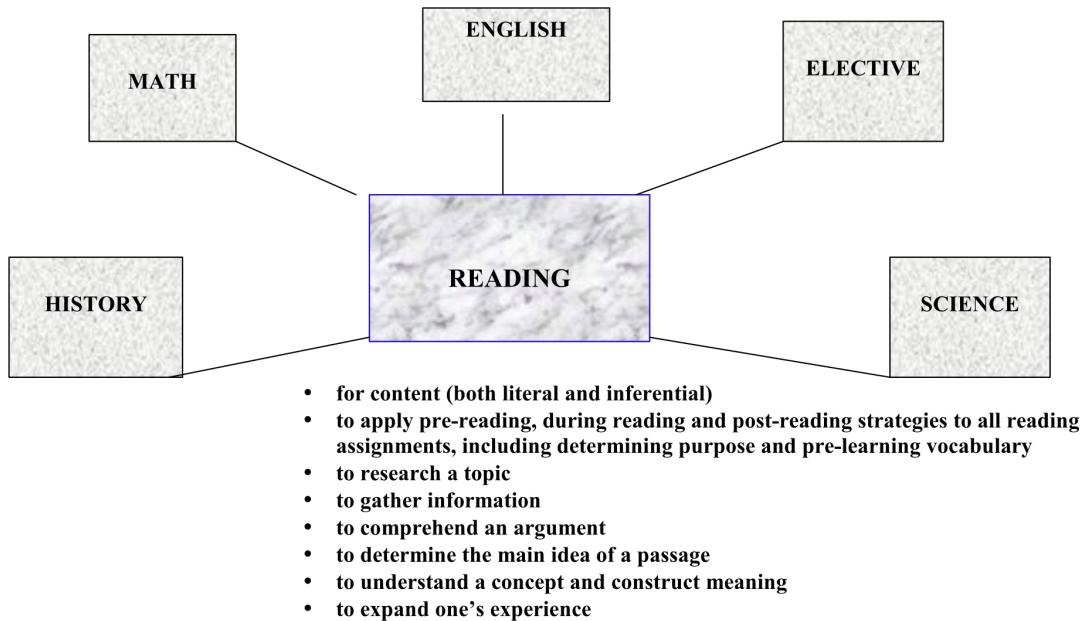
After numerous drafts, the Restructuring Committee felt satisfied with the literacy charts and then sought the input of the rest of the faculty. In small interdisciplinary faculty discussion groups facilitated by members of the Restructuring Committee, suggestions were made. The Restructuring Committee used the input to revise the charts (see next page for charts).

Note in the literacy charts how specific, yet interdisciplinary the literacy skills are. For example, in reading: to read for content, to gather information, to comprehend an argument. In writing: to take notes, to explain one's thinking, to generate a response to what one has read, viewed, or heard. In speaking: to convey one's thinking in complete sentences, to interpret a passage orally, to debate an issue. And, in reasoning: to create, interpret and explain a table, chart, or graph, to interpret or present statistics that support an argument or hypothesis, to use analogies and/or evidence to support one's thinking.

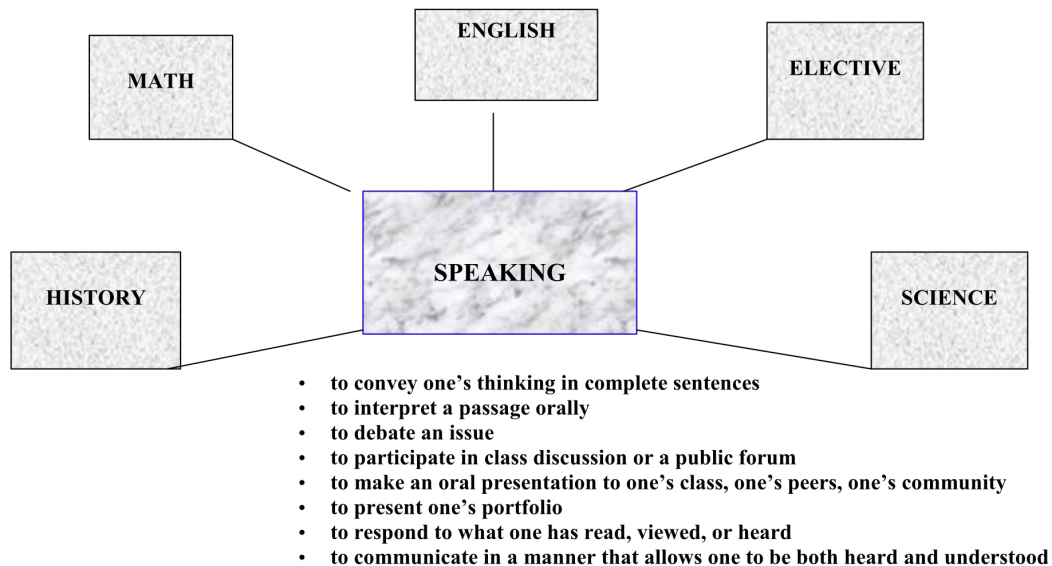
Before finalizing the literacy charts, they were shared with our school council, composed of administrators, faculty, students, parents, and members of the community at large. The council provided critical input. One school council member, the chairman of the region's Chamber of Commerce, stated that if our students possessed these skills, they would be career and college ready. This was a powerful endorsement for the literacy initiative.

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LITERACY CHART: READING

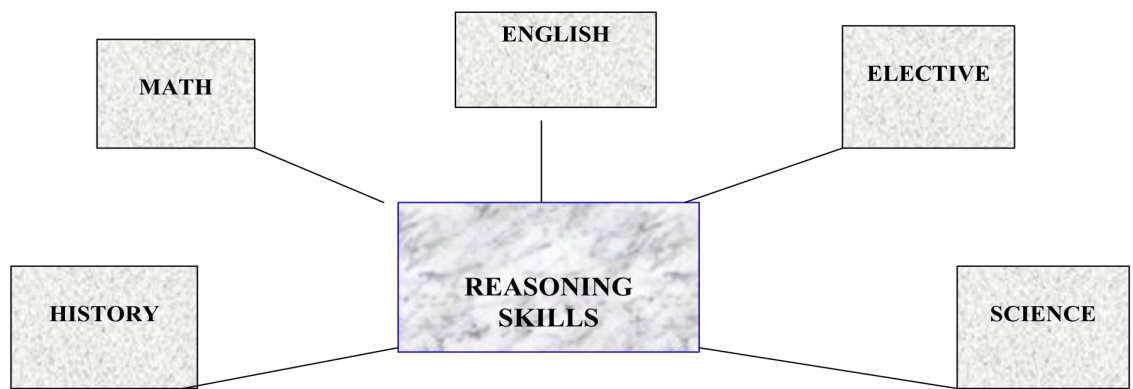


LITERACY CHART: SPEAKING



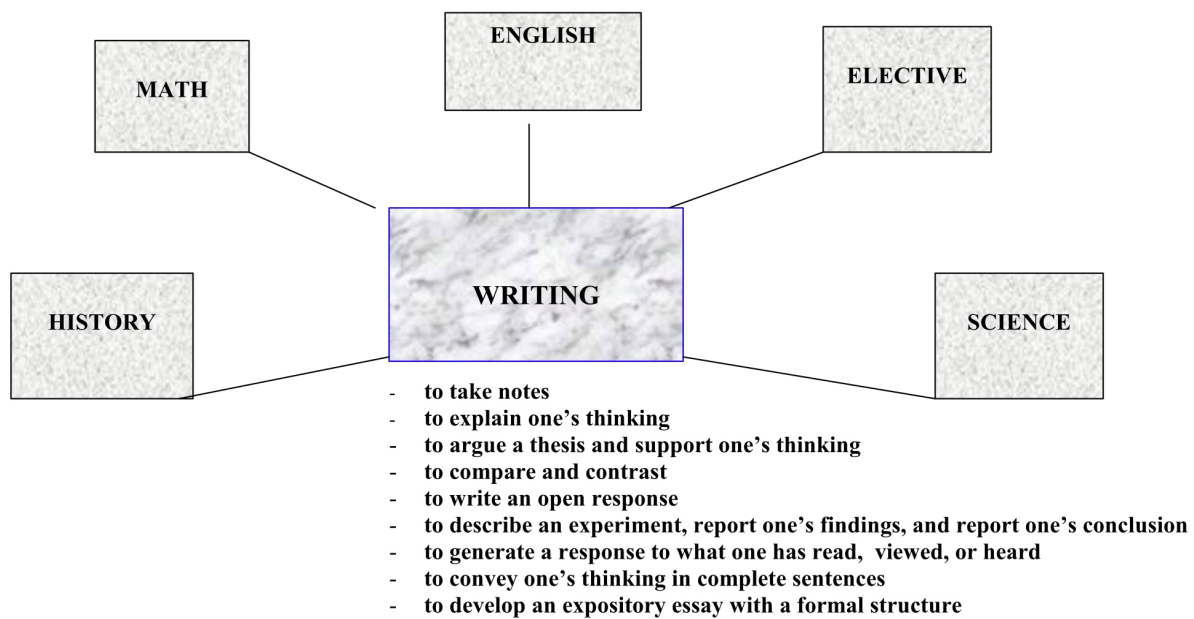
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LITERACY CHART: REASONING SKILLS



- to create, interpret and explain a table, chart or graph
- to compute, interpret and explain numbers
- to read, break down, and solve a word problem
- to interpret and present statistics that support an argument or hypothesis
- to identify a pattern, explain a pattern, and/or make a prediction based on a pattern
- to detect the fallacy in an argument or a proof
- to explain the logic of an argument or solution
- to use analogies and/or evidence to support one's thinking
- to explain and/or interpret relationships of space and time

LITERACY CHART: WRITING



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Now that the literacy skills were settled, the greater challenge lay ahead – how to train more than 300 teachers, who represented every content-area discipline, to teach these skills to their students.

Faculty Meetings Became “Literacy Workshops”

As difficult as it was to define literacy, far more challenging would be training the faculty to teach these skills. As a former history teacher myself, I could identify with how difficult it would be; I had never been trained to teach reading and writing. The challenges were many. First, the Restructuring Committee had to figure out where to begin. There were many skills identified in the four literacy areas of reading, writing, speaking, and reasoning. Students’ performance on the MCAS needed to be improved. There were no in-service days in the contract for training. Perhaps the greatest challenge of all would be in taking on faculty resistance. There was a negative undercurrent throughout the school. Comments, such as “I’m a biology teacher, not an English teacher,” and “It’s not my job to teach reading and writing, I teach art” were common.

This is where the Restructuring Committee’s examination of the data was critical. Because so much of the MCAS involved student writing, and because our students scored so low in every writing question, the Committee selected writing as our first area of focus and specifically targeted the skill “to write an open response.” On the MCAS, students are asked to read a difficult passage, answer a number of multiple choice questions on the reading, and then complete an “open response” on the passage, which means that the student must construct a response, like a short essay, to a question related to the reading.

A subcommittee met and drafted a script of a “literacy workshop” for the faculty on open-response writing. It seemed a daunting

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challenge because this workshop had to have a number of important components. First, the workshop needed to define for teachers in every discipline what open-response writing means. Next, every teacher needed to learn how to teach open-response writing to their students in a specific step-by-step approach. Then, and perhaps most important, every teacher needed to learn how to assess their students' open responses according to a schoolwide rubric, which the Restructuring Committee had developed.

Once the training script was developed, the subcommittee tried it out on the entire Restructuring Committee. We critiqued the workshop, revised it, and improved it until we felt it was ready to be presented to the entire faculty. Because there are no in-services or professional development days in our contract, we had to work within the constraints of the contract and had to use the two faculty meetings per month, each one hour in length by contract, to accomplish this training. Members of the Restructuring Committee would work in training teams to present this "Literacy Workshop: Teaching Open-Response Writing."

During the first training session, which occurred at the beginning of October, the faculty was divided into interdisciplinary groups of about 25 teachers each. Because the workshop was carefully scripted to model how teachers should teach open response, every teacher received exactly the same highly interactive presentation. Teachers were shown examples of open-response questions, had to go through the step-by-step writing process as if they were students themselves, and were taken through the process of assessment using the rubric. Two weeks later, a follow-up literacy workshop was held with teachers in their specific departments.

The purpose of this literacy workshop was to plan implementation of open-response writing in the content areas. Department heads were paired with Restructuring Committee members to run these meetings. Essentially, teachers had to ask themselves how to create

We critiqued the workshop, revised it, and improved it until we felt it was ready to be presented to the entire faculty.

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an open-response writing lesson that supported their content and follow the step-by-step format. After these two literacy workshops, the school was ready to begin implementing the initiative.

The Implementation of the Literacy Initiative

Key to the success of the writing initiative was the plan for implementation. As associate principal for curriculum and instruction at the time, I had the authority to ensure the implementation timeline. The Restructuring Committee believed that the initiative would be successful if students had the chance to practice open-response writing over and over again. So, the plan for implementation followed the schedule of the students. A calendar was created so that every couple of weeks the students would repeat the lesson in a different class.

There were two important reasons for the success of this initiative. First, no one was exempt – every teacher was trained, and every teacher in every content area participated. Second, the students were taught this lesson over and over again.

Although the content of the open-response writing assignment would vary depending upon the subject, the format would be exactly the same. No department or teacher was exempt. For example, the first week in November was assigned to the Science Department. Every science teacher during that week had to teach the open-response writing lesson using science content. The teacher could select the reading to be used, although it needed to be a challenging nonfiction piece that supported the teacher's lesson plan. The open-response writing format was prescribed. Students had to write using the specific open-response steps, and teachers had to assess the students' writing using the rubric. A couple of weeks later, the lesson went to another department, then another, until every teacher taught the lesson. Follow the journey of the students as the year progressed. Over and over again they had open-response lessons.

There were two important reasons for the success of this initiative. First, no one was exempt – every teacher was trained, and every teacher in every content area participated. Second, the students

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were taught this lesson over and over again. Critical to mastering a skill is practice, and because of the way this writing initiative was implemented, students had to practice this many times during the course of the year. By the time testing occurred in April and May, the students were ready.

What Gets Monitored Is What Gets Done

It was not enough to train the faculty and ask them to implement this writing initiative according to the prescribed calendar of implementation. Essential to the success was the monitoring, which provided a measure of quality control. This monitoring came through a prescribed process of examining student work.

After the teacher completed the writing lesson during the assigned week, the teacher then collected the students' writing and assessed it according to the schoolwide rubric developed by the Restructuring Committee (see next page to view). After the teacher completed the assessment process, the student work was then turned into the department head. This allowed the department head to examine the quality of the assignment and the quality of student work in a specific content area. In many cases, this led to powerful conversations among members of the same department about expectations.

Once the department head examined and then discussed the student work, the work was then given to the associate principal, who reviewed the work with a focus on schoolwide standards. This led to a meeting of the entire administrative team to discuss consistency across disciplines and raising standards throughout the school. Out of this meeting came a literacy workshop that focused on defining proficiency. The associate principal not only reviews the work to address schoolwide concerns, but also provides individual feedback to teachers.

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OPEN RESPONSE ASSESSMENT

WRITER'S NAME _____

DATE _____

CONTENT	FORM	
8 • Response contains a clear thesis and insightfully answers all parts of the question. • Response provides relevant and specific textual evidence. • Explanations of evidence are clear and accurate, and demonstrate superior understanding of the material.	4 • Response contains sophisticated and effective use of transitions and strategic repetition indicating complete control of the material. • Response is logically and effectively organized in its thesis, paragraphing, and sequencing of examples. • Response contains clear sentence structure with few or no errors.	
6 • Response contains a clear thesis and adequately answers all parts of the question. • Response provides relevant but general textual evidence. • Explanations of evidence are mostly clear and accurate, and demonstrate good understanding of the material.	3 • Response contains adequate but simplistic use of transitions and strategic repetition. • Response is organized in its thesis, paragraphing, and sequencing of examples. • Response contains clear sentence structure with no distracting errors.	LEGIBILITY 1 • Easy to read 0 • Difficult to read
4 • Response contains a thesis but only partially answers the question. • Response provides a mix of accurate and inaccurate textual evidence. • Explanations of evidence are vague and/or demonstrate limited understanding of the material.	2 • Response contains some inappropriate use of transitions and strategic repetition. • Response demonstrates lapses in the organization of its thesis, paragraphing, and/or sequencing of examples. • Response contains lapses in sentence structure that interfere with the clarity of thought.	

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2 • Response contains a thesis but only minimally answers the question. • Response provides insufficient and/or largely inaccurate textual evidence. • Explanations of evidence are unclear and/or demonstrate minimal understanding of the material.	1 • Response contains incorrect or inadequate use of transitions and strategic repetition. • Response reflects minimal organization of its thesis, paragraphing, and/or sequencing of examples. • Response contains major errors in sentence structure.	LENGTH 1 • Sufficient 0 • Insufficient
0 • Response is incorrect. • Response contains insufficient evidence to show understanding of the material. • Response is off-topic and/or contains irrelevant content.	0 • Response contains no evidence of transitions and strategic repetition. • Response reflects no organization. • Response contains little to no evidence of sentence structure.	

Evaluated by: **Self** **Peer** **Teacher** **(Circle One)**

Comments:

SCORING

13-14 = Advanced

11-12 = Proficient

8-10 = Needs Improvement

0-7 = Failing

_____ **Total Score**

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What About “Buy-In” of the Faculty

One question that I am asked in every presentation I make is how we were able to get the buy-in of the faculty to implement such a large-scale literacy initiative. The honest answer to that question is that initially we did not have the buy-in of the faculty. Rather, we pushed ahead because we (the Restructuring Committee) believed it was the right thing to do. The buy-in came with the improvement in student achievement, and success breeds more success.

When we first began this initiative, we trained ourselves and then moved onto the Administrative Team. The Administrative Team at Brockton High consists of the principal, associate principal, department heads, and four housemasters who over the four color-coded “houses” to which students are randomly assigned. After the Administrative Team went through the training, we faced mixed responses. Some were enthusiastic and ready to roll. There were a significant number of staff who were cautious. They were in uncharted waters when it came to helping their own department members teach these literacy skills, but they were willing to give it a try.

We also faced outright resistance among a few of the department heads. We had one department head, who had been in the position for more than 25 years who tried to undercut the initiative, made negative comments during his department meetings, and refused to fully participate. Ultimately, he was dismissed. It was an unpleasant, but necessary and powerful leadership decision. We forged ahead despite the whining and groaning, always keeping a positive, confident public outlook that this would work.

So when did the buy-in come? I can tell you exactly when. During the first year of this open response writing initiative, many of us on the Restructuring Committee were very optimistic that we would the results in improved student test (MCAS) scores. However, there

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was always a nagging sense of doubt. The students take the test in May, but we do not receive the results until September. So we kept our fingers crossed that we would see some improvement.

In mid-September, I received a call from the state Commissioner of Education David Driscoll, congratulating us on being the most improved school in the Commonwealth of Massachusetts. He indicated that our turnaround was so dramatic that he wanted to come to Brockton High to release the results and congratulate us. We had all the students (more than 1,000) and faculty in the auditorium, which was filled with TV cameras and lots of press. Commissioner Driscoll, a powerful speaker, told the audience, "You are a School of Champions in your City of Champions!" He congratulated the students for their exceptional performance. In just one year, the failure rate was reduced from 41% to 23% and the percentage of students who moved into the proficiency category increased from 27% to 43%. Commissioner Driscoll also congratulated the faculty for their tireless commitment to our literacy initiative, which had brought about this dramatic change. It was then, at that moment in time, that we had the buy-in.

Change in Culture: The Literacy Initiative Takes Hold

Because of the success of the open-response writing training, we began to follow the same implementation plan for many other literacy initiatives. The Restructuring Committee would examine the data to determine what would be the next literacy skill we needed to target. Once we targeted the skill to be worked on (for example, to create, interpret, and explain a table, chart, or graph), we planned a literacy workshop to train the faculty to teach this skill. We followed the same training format. First, we created the script and then practiced on each other. Then we used two faculty meetings in a row as literacy workshops. The first workshop would be organized in interdisciplinary groups to introduce the literacy skill and teach

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Because of the success of the open-response writing training, we began to follow the same implementation plan for many other literacy initiatives.

the process. The second workshop would be scheduled two weeks later and held in specific departments so that each department could best determine how this could be done using its own content area. Once the faculty training was completed, we implemented the initiative using a calendar of implementation. Finally, the student work was first assessed by the teacher using the rubric we developed. The student work then was handed in to the department head and eventually given to the associate principal.

Many additional and successful trainings have been implemented, including ones based on using active reading strategies; analyzing difficult reading; difficult reading/responding to challenging questions; using summarizing strategies; reviewing a text using the table of contents; teaching multiple choice strategies; and developing speaking skills. All of these literacy workshops have been placed into a literacy notebook that has been distributed to every teacher in the school. New teachers are trained every year so that they are up to speed with this schoolwide focus on literacy.

The literacy initiative has become an integral part of the culture of the school. The literacy charts are posted in every classroom, and teachers must use at least one literacy objective every day in their classes. The literacy objectives, along with the content objectives, must be noted in daily lesson plans. The literacy charts are not simply wall decorations; rather, they are used daily by the teachers and the students. Simply put, this literacy initiative is the core learning of Brockton High School.

Reaping the Rewards: The Benefit of the Schoolwide Literacy Initiative

The first literacy initiative in open-response writing was implemented in 2001-02 and the results were impressive. Within two years failure

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rate on the MCAS in ELA dropped from 41% to 14% and students reaching proficiency increased from 27% in 2000 to 62% only two years later. It is important to again emphasize that in Massachusetts every student must pass the MCAS to earn a diploma; there are no exceptions for bilingual students or students with disabilities. The schoolwide implementation of the literacy initiative has resulted in tremendous success for our struggling learners, particularly English language learners and students with IEPs. The literacy skills taught at Brockton are based not only on state standards, but also stretch beyond those standards to the reading, writing, speaking, and reasoning skills our young people need to be successful in their lives beyond high school.

Since the implementation of the first literacy initiative, Brockton High School has received many rewards and recognitions. In 2002, we were honored as a Massachusetts Compass School, one of only 15 schools in the state so designated for demonstrating tremendous improvement on the MCAS. We have been recognized as a National Model School by the International Center for Leadership in Education for the last five years, 2004-08. We were highlighted in the Breaking Ranks II report, published by the National Association of Secondary School Principals, and have been featured by the Northwest Regional Educational Laboratory in its series of reports titled *Schools Making Progress*.

We also have been highlighted by the Rennie Center for Education Research & Policy as the highest performing high school in the Commonwealth of Massachusetts for bilingual students. In 2006, we were one of only six schools in the country (and only two were high schools) to receive the prestigious National School Change Award, sponsored by Fordham University. In 2007, we were honored by *U.S. News & World Report* as a Bronze Medal School.

While all these recognitions are important to our urban high school, the most important honor of all comes every year at our graduation when we are able to award diplomas to our students.

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While all these recognitions are important to our urban high school, the most important honor of all comes every year at our graduation when we are able to award diplomas to our students. Brockton High School has transformed itself from a school mired in low expectations to expecting the best from our students and celebrating success.

Long gone are the days of the administration predicting that our students will not be able to pass the MCAS, lamenting that the test is too long and certainly too challenging for our students. Now, thanks to our literacy initiative and the tenacity and hard work of our faculty and students, Brockton High is a school all about the academic success of every student with a team of faculty eager for the MCAS scores to arrive, taking pride in the success of each and every one of their students. Brockton High School has much to celebrate.

Grow Staff Through Professional Learning

Marca Alexander

Marca Alexander
is Principal of
Bay High School
in Bay St. Louis,
Mississippi.

Bay High School is located in Bay St. Louis, Mississippi, on the western Mississippi Gulf Coast, about 60 miles east of New Orleans. It serves students in grades 9-12 from the small towns of Bay St. Louis and Waveland.

In late May 2004, Bay High School was chosen as one of four schools in the state to participate in the High School Redesign Initiative, based on a proposal submitted by the school district. With this came a grant of \$500,000 to be used over three years to restructure our school. This announcement came following the close of the school year, which allowed for intense planning to begin over the summer months.

The proposal, which addressed several issues that hindered student achievement, was based largely on the work of Johns Hopkins University's Talent Development High Schools and the current research available on successful schools and best practices in education.

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Our goals were to:

- personalize the learning environment by restructuring the school into smaller learning communities, or career academies, and by developing a viable student advisory program
- imbed the world of work in the education process through adult-world immersion
- defragment learning so that students connect the course content in one subject to that of another discipline
- challenge students to reflect on school- and community-based learning opportunities
- develop community and business partnerships to support real-world learning
- provide opportunities for teachers to grow professionally to meet the ever-changing needs of students

Over the course of the summer months, the Administrative Team worked to put the various pieces in place that would facilitate the initial implementation of this proposal. An academy coordinator was brought on staff. This person's primary role was to work with the business sector in garnering support and to assist in working with all stakeholders in the development of programming directly connected to the proposal.

In spring 2004, Bay High School had begun the task of encapsulating its beliefs, mission, and purpose as a part of an upcoming Southern Association of Schools and Colleges (SASC) accreditation review. A comprehensive, consensus building process that involved

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administrators, teachers, paraprofessionals, parents, students, business leaders, and community members was employed.

The Leadership Team took all the brainstorming ideas and organized the information into a list of beliefs.

Initially, the faculty and staff of Bay High met to brainstorm key concepts from which our bottom-line beliefs could be drawn. Several faculty meetings were devoted to identifying and refining those key aspects of the education process that were considered to be fundamental to a successful school. Each person was challenged to reflect on what a great school looks, feels, and sounds like. The most up-to-date research was discussed, as well as the current school levels of performance. The Leadership Team took all the brainstorming ideas and organized the information into a list of beliefs. A rough draft was sent via e-mails and staff forums to the faculty and other staff for feedback. The Leadership Team reworked each draft statement for clarity and brevity. That school year came to a close prior to the completion of our work in this area. It was decided that we would continue the process during the first months of the coming year.

The 2005/2006 school year opened with great excitement over being selected to participate in the High School Redesign Initiative. Professional development during the first days of the teachers' return focused on integrating the curriculum and differentiated learning.

Then it happened. On August 29, 2005, Hurricane Katrina wreaked havoc on our state, our community, our school, and on the lives of all of our faculty and students. In fourteen short hours, Katrina had changed everyone and every thing. While the entire school district and surrounding community lay in ruin, experts in the field of recovery from such events shared time and again of the importance of re-establishing a sense of normalcy for the district's children. Everything in the district had been lost except a few shells of buildings, and the District Administrative Team began its work to get our schools reopened.

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The districtwide issues at hand were enormous. At Bay High School, two thirds of the administrative and support team had lost everything, as did approximately half of the faculty and staff. Those who were spared complete loss had experienced severe damage. The enrollment of the school plummeted from 749 the day before the storm to 322 when school reopened on November 7, 2005. As for the school itself, major renovation was required to clean and restore the structure. All classroom furniture and teaching resources were lost, as were all textbooks and classroom supplies. Basically, the structure had to be dried out, stripped, disinfected, painted, refurbished, and re-equipped. It needed to be done quickly.

On August 29, 2005,
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students.

The students of our school missed 45 days of instruction. School reopened for teachers on November 1 and for students on November 7. We had been reduced to the basics, but we were back in school and glad to be there. Prior to Katrina, Bay High had a 54% free and reduced lunch rate. Because of the number of students living in temporary housing, that percentage had soared to 98%. The lack of adequate housing had forced more than half of our enrollment to relocate. For those who were left, psychological counseling was necessary and assistance in securing even the most basic of needs, such as a coat or a FEMA trailer, frequently became an essential task.

The operation of the school had also required drastic changes to help students meet state graduation requirements. During the time that students were out of school, the master schedule had to be revamped to move from a 4x4 block schedule to a six-period day so that these requirements could be met. Every student schedule had to be reworked, with many elective programs taking a tremendous hit in student participation.

There was nothing that could be done except to start with what was left and begin the rebuilding process. Life had changed as a result

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of Hurricane Katrina. However, that change was not all bad. As principal of Bay High School, my responsibility was to steer efforts toward the realization of prior school goals, collaboratively set new goals, and create a respite from the ruin that existed in the personal lives of those in the school. This was not an easy task.

As principal of Bay High School, my responsibility was to steer efforts toward the realization of prior school goals, collaboratively set new goals, and create a respite from the ruin that existed in the personal lives of those in the school.

As teachers worked to provide the necessary learning experiences required for students in the classroom, the Leadership Team resumed its efforts to refine the work that had been done the previous year in finalizing the mission and belief statements for the school's restructuring. While most documents and files had been lost, documents related to our school restructuring initiative had been salvaged. As the Leadership Team worked to refine the input from the faculty and staff, the rough draft was shared with a group of parents, the Student Government Association, and the Dream Team (a group of business leaders who serve on the Redesign Leadership Team). Input solicited from these groups was incorporated into the rough draft developed by the Leadership Team prior to working to finalize it. Since becoming a part of the pilot to redesign the way high schools traditionally operate, many new facets had to be considered in the final product.

The Leadership Team felt strongly that the belief statements were valid as written but knew that stakeholders would not be able to commit them to memory. As a result, the team pared the mission, purpose, and beliefs down to a simple statement. Collaboration between the Academy Coordinator and our Dream Team Chairperson, a local marketing expert and graphic designer, led to the production of a t-shirt that we provide yearly to our students which sums up our beliefs, focuses student attention on the goals of our advisory program, and reminds everyone of our mission. It simply says, "At Bay High School, we believe in the TIGER Spirit: Teamwork, Initiative, Greatness, Ethics, Responsibility, and Spirit."

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At the same time, professional development time was used to collectively examine the current research on the best practices of successful schools and to select those practices which would allow us to meet the needs of our students. Discussions focused on the effective implementation of identified strategies and the resources necessary for implementation. Teacher input was recorded as they tailored the implementation of each strategy to address our specific needs. Opportunities were provided that allowed teachers to collaborate on grade-level initiatives such as:

- 9th grade transition programs
- defining and refining our smaller learning communities or career academies
- developing local courses of study for guiding student course selection within specific career clusters throughout their high school years
- defining and developing the Career Service Learning program to move students into the world of work
- implementing a senior project based on the Career Service Learning program and career exploration that students complete throughout their high school years

The Leadership Team met regularly, as did the Dream Team, to formulate a definitive plan of action to guide school improvement and change efforts.

The Leadership Team met regularly, as did the Dream Team, to formulate a definitive plan of action to guide school improvement and change efforts. Goals were defined with specific objectives identified to direct our work. Activities and strategies to achieve each objective were identified that included the actions that needed to occur and what the staff had to do. A timeline was developed which noted when each strategy would begin and end. Professional development was identified that would allow the staff to acquire the necessary skills and attitudes to implement each activity. New and existing resources that were needed to accomplish each activity were identified. Individuals were assigned leadership roles for overseeing various aspects of implementation. Most important, ongoing formative and summative evidence was to be gathered to show

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that each activity and/or goal was making a difference in student outcomes was identified. This action plan was to be the roadmap to get us where we needed to go.

Just as the action plan was to be the roadmap to get us where we needed to go, there had to be a specific measurement that let us know when we got there. Once again, the Leadership Team ironed out an evaluation tool in which each strategy for implementation was listed, dates for evaluation selected, and recommendations for continued implementation/change made. Specific benchmarks were selected to monitor progress toward the goals. An evaluation checklist was fleshed out in which baseline and yearly data was to be recorded so that even minute-by-minute progress could be tracked. The degree of change taking place as a part of the High School Redesign Initiative was huge.

As a former trainer for the Mississippi Department of Education's Effective Schools and Classroom Management module, I regularly shared a set of commonsense principles of learning that were set forth in that training. While these principles for learning were intended to address the needs of students, they can also be applied when working with the teachers to bring about change within the school, especially when the teacher assumes the role of learner.

1. Learning is initiated when there is an urgent need on the part of the learner. Analyzing student achievement data is an excellent method of fostering a perceived need. Continually keeping a focus on the available data also creates a sense of urgency for that change to occur. Change for the sake of change is rarely accepted; people are more open to change based on data.
2. Learning is personalized when it takes into account the differences of learners. Both large and small group learning opportunities are needed for all teachers to acquire the skills

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and knowledge that is needed for successful implementation of schoolwide strategies. At Bay High School, all faculty participate in initial training of initiatives such as integrated curriculum, differentiating instruction, and the Rigor and Relevance Framework. Many teachers will gain a full understanding through whole-group instruction, but there will be a few that will need follow-up. This follow-up and further small group work is handled through smaller learning communities in which the focus is placed on best practices. Just as teachers do with students, the leader can monitor each person's level of understanding and personalize the content so that application can be seen in each classroom.

Learning is personalized when it takes into account the differences of learners.

3. Learning is enriched in cheerful, comfortable, and purposeful learning environments. Pay careful attention to the tone set for opportunities in which teachers are expected to acquire and implement new strategies. Be certain to laugh while making expectations clear. Instructional coaching is an excellent model for achieving this. Ongoing dialogue with a teacher is important and is an integral part in ensuring that change will really take place.
4. Learning is contagious when accompanied by praise. Through instructional coaching, frequent opportunities exist to recognize individual efforts of teachers and students. Frequent use of praise, when it is deserved, makes those times when correction is needed better received. It also spurs everyone to give just a bit more effort.
5. Learning is sustained by interest. Rather than involving everyone in everything, select assignments and tasks that are relevant to the specific teacher or group of teachers. Tap into the talents and strengths of the faculty. Also, provide opportunities to connect new teachers with the longtime ones.

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Learning is enhanced when two or more senses are used at the same time. Model for teachers the same teaching practices that are expected in day-to-day instruction with students.

6. Learning is enhanced when two or more senses are used at the same time. Model for teachers the same teaching practices that are expected in day-to-day instruction with students. This is a tremendous opportunity to point out the value of what the teachers are being asked to do in the classroom. With any luck, someone will comment on how he or she liked a particular strategy and the connection can be made to its use in the classroom.
7. Learning is high powered when the conditions of learning are organized and explained. Make sure that meticulous preparation has gone into the planning of all teacher training sessions. By doing so, a message is sent to the teachers that their time is valuable and what is being shared with them is deserving of their efforts. Again, model the same qualities in the presentation that are expected of them in the classroom. This also presents an opportunity for instructional coaching to be used to increase teacher capacity in specific instructional strategies.
8. Learning is increased when it proceeds from whole to part and back to whole. It is important for stakeholders to have a grasp of the “big picture” before attempting to work out the finer details. A great deal of time was spent communicating the overall plan to the faculty and staff. Each time through, there were several “ah-ha” experiences in which people saw how all of the various pieces connected together to build the comprehensive plan.
9. Learning is internalized through active participation. Teachers who take an active role in the development of programming and other initiatives view these things as their own. Collaboration between teachers is critical to success. There is power in allowing teachers to take this active role.

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10. People believe they are learning something when the conditions of learning are real. Seize opportunities to link change efforts to what is happening in the classroom. For individuals who are frequently resistant to change, framing the strategy or initiative in terms that become real to the teacher elicits a positive response. The connection also dispels the feeling that is frequently common among educators toward new initiative —“This, too, shall pass.”
11. Learning is reinforced when it enables learners to attain personal goals. There are really very few teachers who are not interested in doing their jobs better. The leader who taps into the power of a teacher who realizes how an initiative will make his/her job better has a true advocate for the initiative.
12. Learning is solidified through meaningful repetition and valued through personal relevance. Change takes a tremendous amount of time and ongoing support if the initiatives are to take root and become institutionalized. Being a visible presence throughout the school, taking the time to observe the teaching and learning experiences within the school, and spending time revisiting and reviewing key strategies with teachers all contribute to changing the education system for the better.

In reflecting over the past few years about what really brings about positive change, I have realized that there are several key practices that guide change:

- **Get others involved.** Listen intently to what is being said at all times. By listening to others on a daily basis, a better picture of the beliefs, philosophy, and needs of all stakeholders can be formulated. Tap into the collective thought and make connections between the old and the new.

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- **Work to develop a shared vision.** Everyone must know where it is that they are headed or they will never know when they get there.
- **Solicit buy-in from each stakeholder group.** Change is far easier when the support network is firmly in place. It is well worth the time and effort, especially when things get tough. Take advantage of the concept of synergy because the outcome then belongs to everyone.
- **Examine the leadership role that is required to effectively implement change.** Think of the farmer who tills the soil, plants the seed, and waters it; the seed grows on its own. However, the farmer does have to be watchful for any weeds that work to choke out the seedling and to provide the proper nurture for the plant. The ideal situation occurs when the farmer (leader) plants the seed and is able to step aside while others water, nurture, and tend the plant to maturity.
- **Incorporate distributive leadership techniques.** Use formal and informal leaders from inside and outside of the school setting. The time spent sharing your vision with these key people will allow them to spread that same vision to the next level until it permeates all stakeholder groups. Selecting positive individuals to serve in this capacity will ensure that the fire gets lit and spreads. Remember, major changes are rarely effective when mandated without support.
- **Incorporate instructional coaching into daily interactions with faculty to ensure that identified practices are imbedded in the classroom.** Ongoing dialogue will let teachers know that they are expected to implement identified practices in their classrooms.

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- **Develop a detailed action plan to assist in efforts for change.** Care has to be taken not to get bogged down in minutia when sweeping reform is being implemented. A detailed action plan outlines the steps to be taken, who is responsible for overseeing it, and how it is to be monitored for effectiveness. When this action plan is followed by an equally detailed method of evaluation, it is much easier to follow through with concepts and ideas. It also allows for tasks to be delegated to capable people and makes use of formal and informal leaders throughout the school.
- **Take the time to recognize teacher efforts.** During regularly scheduled faculty meetings, a “Dare to Share” spotlights what is going on in the classroom. Efforts are made to focus on the implementation of initiatives relating to school improvement efforts. Exemplary practices are shared by teachers who are implementing a concept, strategy, or initiative in the classroom. This practice allows for everyone to be the star at something. It is an effective motivator for increasing implementation levels throughout the school.
- **Keep the vision forefront in your interactions with all stakeholders.** Keep spreading the news and garnering support. Then, as others come on board, step aside and allow them to take the leadership roles.

Care has to be taken not to get bogged down in minutia when sweeping reform is being implemented.

In closing, it must be said that leading change rarely is an easy task. There are always those who resist or refuse to move forward. Do not allow that negativity to hinder what needs to be done. Continually keep the focus on the students because, after all, they are deserving of our best efforts.

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Hold Teams Accountable for Learning Results

Joy Barnhart

Dr. Joy Barnhart retired in 2007 after more than three decades as a school administrator. She most recently was Principal of W.T. White High School in Dallas, Texas.

Leadership to improve learning on a school campus is a noble and challenging, but feasible, mission. It is one that must ensure learning for all. During my 33 year tenure as an elementary, middle, and high school principal, I had the opportunity to experience many approaches to instructional improvement in all content areas in large, diverse, and low socio-economic status schools. These schools had experienced a myriad of problems resulting in underachieving students and struggling teachers, who often believed they were doing their best.

It has been my observation that most people do what they know how to do, following their beliefs about who can learn. Addressing the issue of holding teachers accountable for student learning begins with building a belief system that reflects the premise that all can and should learn. Observable teacher behaviors, actions, and words must communicate to each individual student: “I know you can learn what I am going to teach.” High expectations are observable. I believe it is the responsibility of school leaders to help teachers internalize and demonstrate high-expectation behavior. The Teacher Expectation and Student Achievement (TESA) Interaction Model is one tool to use to develop high-expectation behavior. My definition of high-expectation behavior is never giving up on student learning until mastery levels are achieved.

Master Schedule and Common Team Planning Time

With a standards-based curriculum, there are steps that can be planned and implemented to move teachers to mastery level teaching. Initially, a master schedule that allows teachers to have time to work together in both interdisciplinary teams (small learning communities) and content teams must be developed. Daily and weekly team time within the school day must be given the highest priority in the master schedule. Team planning time should be devoted to addressing the specific instructional needs

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of the students or the additional training needs of the teachers. When there is “collegial time,” there will be time for instructional improvement efforts to be systemically and constantly planned, reviewed, discussed, implemented or evaluated, and changed.

Principal Participation in Team Meetings

The principal should participate and lead in these team meetings and have conversations with the teachers about expected student performance goals.

Learning goals for students and individual performance goals for teachers should be established. These goals should be shared with students and posted in the classrooms and the halls. During team time, teachers have the opportunity to share issues and problems with the principal and their peers, discuss teaching results, and request assistance in a supportive atmosphere. Keeping the team focused on achievement goals, while offering support and help when needed, has a positive impact on productivity and performance.

Whole School Involvement

At the beginning of the school year, I met with the students in each grade level, I shared my expectations with the students, and the teachers listened. This is what I said: “This school has to be one that makes you successful. If you’re not successful, the principal standing in front of you needs to be fired. She doesn’t need to be here.” I also told them: “If you ever feel like you are being mistreated or there is an injustice done to you, you have my permission to leave the classroom and come and tell me.”

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My words seemed somewhat threatening to teachers. However, teacher behavior that affirmed rather than negated students was extremely important to me. There were interactions between students and teachers that needed to change and become more positive. If students felt that there was an injustice or an unkind statement or action, they knew that they had permission to come and tell me. Did that happen often? No, because the decrease in teacher behaviors that were negative or demeaning decreased considerably. So, I think the students have an impact on helping people change. When you have expectations of the students and they know what you want, they help foster that growth in teachers.

Take Advantage of Every Opportunity

You have to recognize performance and express expectations at every opportunity.

You have to recognize performance and express expectations at every opportunity. Every interaction between a teacher and a student is an opportunity for learning. Recognize when teachers teach a rigorous lesson with depth and complexity, one that takes time to plan, teach, grade, and brings the student to a higher level of learning. How do you recognize that? You spend time with teachers and students in the classroom and you applaud their work.

When you spend a great deal of time in the classroom, you can ask how is this group doing today. What is the objective? I can have quick accountability talks with the students and say, for example, “Ok, I’m in here. I know what I’m expecting from mathematics in Algebra II. Is there student understanding? Is there someone struggling whom I can help?” The teacher is not going to single out any one student in that room. The students will understand my expectations and learn the content, or they may see me in the hall later and ask for more help. I can then share the request with the teacher and help plan an intervention.

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One of the practices I did as routine interaction was brought to my attention by a visiting consultant. One of the many visitors to W.T. White showed up one day as students were entering the school. My daily routine was to cruise the corridors to chat with students. I requested this guest to join me in my walk. I was not about to eliminate my interaction with students regardless of how important this visitor was. As I chatted with this guest, we passed the attendance office, where a new student and a parent were standing.

New student registration was an everyday occurrence in this school. I interrupted my conversation with the consultant to introduce myself to the new student and parent and to assure them that the office would be open shortly to enroll them. The student happened to have his transcript, and when I noticed the poor grades on it, I remarked to the student and parent that we have higher expectations than that at this school. I asked the parent to support me in increasing the student's expectation for high-quality work.

I excused myself and continued my walk around with the consultant. The consultant was surprised at my behavior and what a remarkable example that brief conversation was to convey high expectations. Every interaction is an opportunity to convey high expectations for learning.

Focus on Learning

Improvement comes from teachers changing instructional practices in the classroom. Teams need to be reminded of this. It seems to best be accomplished with deliberate analysis and discussion in team meetings. Formative and summative student achievement data must be an incessant focus in team meetings, with purposeful attention to student profiles as well as teacher profiles. Who successfully taught an objective to students who had been

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experiencing difficulty? Whose students made the most gains on an objective and what strategy was used? Teams can use district benchmarks or develop their own to assess progress, but they must be timely and used as part of the process. Each teacher's results are examined so reteaching can occur or a better instructional strategy can be implemented.

Teacher Training

Sharing successful strategies during team time is an important step.

Teacher training is a critical ingredient. Teams can be held accountable when the principal has helped individual teachers learn how to consistently use best practice strategies. These strategies may include managing and motivating students, using a standards-based curriculum, planning rigorous and relevant lessons, grading, assessment, questioning techniques, discussions on accountability, and specific-content pedagogy — any training that fosters student learning.

Sharing successful strategies during team time is an important step. In every one of my school assignments, there were master teachers whose students learned the required content. They were able to address factors that interfered with learning and developed solutions to overcome obstacles. They used strategies that made a difference. Their performance profiles reflected their success. These teachers shared their strategies in team meetings and demonstrated them in their classrooms and in team members' classrooms. Team members practiced the strategies and were routinely coached and supported by the teacher who shared the strategy. Solutions to problems were discussed and developed.

For example, if 9th grade algebra teachers planned to teach the slope-intercept form of a linear function, the objective would be discussed in the content team meeting. The lesson plan and the lesson cycle

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might be topics, with suggestions about relevance, on how best to model the concept, guided practice problems, or how best to check for understanding. After instruction occurs, learning would be assessed. Student scores would be reviewed in a team meeting. If a group of students did not score well, then the approach might be to help a teacher with a strategy or a “reteach” of the concept during tutoring time. The group plans the intervention effort.

Relationships

As a result of the planned team collaboration time, collegial relationships became supportive and positive. As problems arose, the team found solutions. Teachers in need of help were coached and achieved increments of success. Teams became confident and were willing to be held accountable. The teachers began to assume leadership roles in the school improvement efforts.

I recognized and applauded increments of success in the team meetings and in the classrooms. As I observed classes, I would praise students for their achievements and praise teachers for leading student learning. My behavior always reflected my affirmation of and belief in the teacher’s abilities to ensure student learning.

As a member of these team meetings, I also served as a teacher mentor. The established goals were always a focus, with deliberate discussions on a weekly basis. But team members were not threatened about expected performance. Each had the opportunity to ask for help. If more intense training was needed, I scheduled onsite or off-campus staff development sessions. I arranged for substitutes so teachers could observe others. I found solutions to problems interfering with the teacher’s ability to practice the strategy and experience incremental success. These problems encompassed recalcitrant students who needed intervention, a

Relationships are critical to the success of any organization. I reinforced this belief at every opportunity.

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differentiated approach needed for students with learning disabilities, needed resources, scheduling issues, tutoring time, or any factor that hindered student learning.

Relationships are critical to the success of any organization. I reinforced this belief at every opportunity. I had high expectations for teachers to support each other and not leave anyone isolated — students or teachers. Collegial efforts were considered and were a part of the teacher's yearly evaluation. This expectation was communicated to the staff during every staff meeting. All knew they had to work together. The school would only be good if all of the teachers were good.

Relationships were an integral part of improved yearly test scores, which resulted in our school receiving state and national recognition for closing the student achievement gap.

Summary

Teams can and should be held accountable for student learning when there are procedures in place that support teachers and foster success. High-performance expectations for students and teachers must be observable. The master schedule must ensure collaborative team time. Data analysis, following routinely administered assessments, must receive high priority in team meetings. Sharing best strategies and coaching team members to use these strategies are crucial. Collegial relationships will provide support so teachers can build confidence and realize their increments of success. Principal participation in team meetings is the catalyst for all of the preceding, which must be orchestrated, managed, encouraged, and applauded.

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There are instances when teachers do not improve and must be counseled into endeavors outside of education. With the repeated opportunities for professional growth and support made available, documentation exists to recommend termination, if necessary.

Principals must be as dedicated and diligent in efforts to help teachers learn and use best practices in the same way they expect teachers to help all students learn. Personnel who are sincerely interested in and passionate about student learning become master teachers and are receptive to being held accountable when there are practices and procedures in place that foster the acquisition of mastery teaching skills. The performance of these teachers must be acknowledged and celebrated.

From the day we opened in 2000, our mission at Kennesaw Mountain High School has been simple and clear: to prepare students for the world they will enter when they leave high school by giving them the skills they will need to compete in the 21st century workplace. We were determined to engage students in rigorous instruction that would result in meaningful learning that would stay with them “beyond the test.” Armed with a strong curriculum, clear benchmarks, and lofty goals, we focused our sights on providing instruction that would ensure student learning at the highest levels.

Still, with our mission clear and our focus sharp, we found ourselves asking the same questions plagued by the same frustrations that are the bane of teachers everywhere. How do we structure classroom instruction to encourage students’ natural curiosity and passion? How do we ensure that students truly know the material? How do we motivate our students to care about learning?

In looking for answers to these questions, I was intrigued by a magazine article I read in which a prominent college football coach

**Inspire
Instructional
Innovation**

*Susan
Gunderman*

Susan Gunderman
retired in 2007
as Principal of
Kennesaw Mountain
High School in
Kennesaw, Georgia.

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was asked how he motivated his players to give their maximum effort in every game. He responded that he could not motivate his players. Rather, his job was to give them the ways and reasons to motivate themselves. His words resonated with me as I realized that this concept is as true in the classroom as it is on the athletic field. Our job as educators is not only to provide a rigorous curriculum for our students, but also to give them the reasons and ways to motivate themselves.

At Kennesaw Mountain, we were doing a great job of providing a rigorous curriculum for our students, but we were failing to connect instruction to their world outside the classroom. It soon became clear that our focus on a rigorous curriculum content was only half of our task. Clearly, if our students did not see the *relevance* in the material presented to them, if they could not connect classroom instruction to events in their own lives, they would not be motivated to truly engage in learning. These realizations redefined our professional conversations related to student achievement and led us to the International Center's Rigor/Relevance Framework as a tool for fusing a rigorous curriculum with relevant instruction.

To increase rigor and improve instruction, many teachers mistakenly believe they must make the material more difficult for students. I have had teachers tell me, in all sincerity, that they know their course is rigorous because so many students fail! In reality, rigor is not about difficulty; it is about increasing the complexity of students' thinking in the relation to the material they are learning and providing them with opportunities to relate their learning to real-world situations.

The Rigor/Relevance Framework provides a concrete way for teachers to assess the rigor of their instruction relative to the complexity of the material and the level of application students employ to show mastery of the information. As teachers at Kennesaw

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Mountain developed a deep understanding of the pedagogic theories and instructional strategies provided by the Framework, we began to establish a culture that emphasized student outcomes rather than teacher techniques and focused on learning rather than teaching.

See Chapter 3
for more on the
Rigor/Relevance
Framework.

Many teachers, especially those of us with a number of years under our belts, have a fairly prescribed notion of what a classroom should look like: neat rows, compliant students, and the teacher is at the head of the class dispensing information. One of the first paradigm shifts we needed to make at Kennesaw Mountain was to shift the image of the teacher from being “the sage on stage” to becoming “the guide on the side.” Using management guru Peter Singe’s analogy, we needed to “flip the funnel” of our expectations. Rather than teachers having all the knowledge and dispensing it to students, teachers needed to move into the role of facilitator of student learning. Using the International Center’s *Rigor and Relevance Handbook*, our teachers soon developed a repertoire of strategies that shifted our instructional focus to our students. We decided to focus on the following five strategies.

1. **Project-based learning.** Incorporating long-term projects into classroom instruction gives students practice in solving authentic, real-world problems. Community projects also afford the opportunity to involve members of the business community in evaluating student projects, thus providing an “authentic audience” for their work. Projects at Kennesaw Mountain include researching and designing children’s books on health and wellness (anatomy and physiology), designing a working catapult (collaboration of world history and physics), and urban renewal through community planning (economics).
2. **Collaborative learning groups.** Group activity and collaborative learning groups can help motivate students

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by allowing them to share the “thinking load” and to act as models for each other. Grouping different students together based on strength of content knowledge, learning style, and interests allows students to identify their own strengths and weaknesses while drawing on the support of their peers.

3. **Probing questions.** Posing questions that encourage the use of problem-solving processes rather than just asking for correct answers encourages students to use concepts they have learned to formulate new scenarios. Whereas questions with right or wrong answers tend to stifle student creativity, provocative questions can spur students to high levels of critical thinking.
4. **Debates.** Debates are a time-honored means of encouraging critical thinking, personal expression, and tolerance of others’ opinions. They also provide students with an exciting forum for discussion, deliberation, and evaluation of their grasp of the concepts presented in classroom instruction. Each year, students in the government classes participate in public debate of pertinent, and often controversial, issues. The judges, including the mayor of our town and other elected officials, always are impressed with the students’ solid preparation and informed opinions.
5. **Presentations.** Making a presentation requires students to organize their information and deliver their message in a clear concise manner. Oral presentations also allow students to develop public speaking skills and the ability to “think on their feet” as they field questions from classmates. Students in our health classes developed a presentation that focused on the nutritional value of the offerings in our vending machines. In order to “stretch” the lesson into Quadrant D instruction, students used their presentation to work with our snack vendor to develop a more nutritional selection of items to be offered in the machines.

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The vendor knew that he had to meet the students' expectations in order to retain his contract, an element that made the lesson truly real-world.

See Chapter 3 for more information on the Rigor/Relevance Framework and Quadrant D application.

When instruction is focused on student outcomes rather than teacher technique, learning becomes inherently natural for students. In his essay, "The Loss of the Creature," Walter Percy contrasts spontaneous learning borne of student curiosity with learning that is artificially structured in the classroom.

A young Falkland Islander walking along a beach and spying a dead dogfish and going to work on it with his jackknife has, in a fashion, wholly unprovided for in modern educational theory, a great advantage over the Scarsdale high school pupil who finds the dogfish on his laboratory desk. The student is handed an assignment that includes a list of every item he will need and all the steps involved. He finds his tools laid out on the table. Every contingency has been provided for in advance except his curiosity about dogfish.

See the end of Susan Gunderman's section for a sample Quadrant D lesson.

Percy's point is well taken. If it fails to provoke the student's curiosity and passion for learning, the science lesson is merely busywork, with the student relegated to the passive role of observer rather than active, enthusiastic participant. As Percy observed, this kind of teaching will squeeze the life out of any interest the student might have in the learning.

Redirecting our focus from teaching to learning also meant concentrating on the quality of student outcomes. Teachers worked hard to design instruction of rigorous content that engaged students' curiosity and was connected to real-life experiences. As teachers were increasingly providing Quadrant D instruction, they realized they also needed to align their evaluations of student learning with

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their teaching. Our goal was not only to teach in the Quadrant D area, but also to assess students at this high level as well. Two areas of focus were homework assignments and assessments.

As we began our discussions about the quality of our assessments, teachers first focused on defining the purpose of assessment. Collectively, we came to the conclusion that assessment should be part of the learning process, designed to give feedback to students and teachers about the progress of the learning taking place. In its best form, assessments should “demystify” the grading process. That is, students should have a clear understanding of what they should know, as well as how they will be expected to demonstrate mastery of that knowledge. We determined that effective assessments share some common elements.

- **Assessments that enhance classroom instruction.** Homework assignments should be meaningful to students and serve to extend classroom work. Our staff agreed that homework should serve one of three purposes: practice, preparation for future learning, or extension of the learning that stretches the student into higher quadrant thinking.
- **Assessments that are ongoing rather than sporadic.** Meaningful assessment needs to provide students and teachers with immediate feedback that not only informs students as to the quality of their work, but also helps teachers adjust instruction to match the current level of student learning. Ongoing assessments allow teachers to gain a “panoramic view” of students’ understanding of the material rather than the myopic view provided by the isolated “snapshots” of unit tests.
- **Assessments that are content-valid.** Too often we discover that our assessments do not measure what is actually being taught. When that occurs, we cannot rely on test results to

Using Assessment for Instruction, a resource kit published by the International Center, is devoted to this topic.

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evaluate the quality of instruction. Assessments need to be directly tied to standards and instructional objectives and linked to classroom activities in order to be a meaningful evaluation of student learning.

- **Assessments in which students are involved in the design and evaluation.** Students are usually apprehensive when facing a major exam and often lament that they have no idea what is going to be on test. To make matters worse, when they are given the results, they often have no clear understanding of how they could have been better prepared for the test. When students are given the opportunity to be involved in the design of an assessment and participate in meaningful conversation about the results, the assessment truly becomes part of the learning progress and can be used to greatly enhance instruction. Rubrics are a wonderful tool for involving students in the assessment process. We found the Web site *Rubistar.com* very helpful for designing rubrics.

When students are given the opportunity to be involved in the design of an assessment and participate in meaningful conversation about the results, the assessment truly becomes part of the learning progress.

In our quest to provide our students with the highest-quality education possible, we came to the following conclusions that directed all our actions.

- Students will actively engage in instruction if their curiosity and passion for learning are ignited.
- Providing a rigorous curriculum is possible only when students see the relevance in what they are learning.

Our staff have always been passionate about teaching. However, to provide truly effective instruction, we had to change our paradigm of teaching to focus on the outcome of student learning rather than the structure of instruction. Our work led us to hold some common beliefs about effective teaching.

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- The only true measure of our institutional success is the quality of our students' performance in real-world situations.
- The primary responsibility of every staff member is the continual development of instructional strategies and meaningful valid assessments that engage students in high levels of critical thinking and performance mastery.
- Our ultimate responsibility is to provide students with a long-range framework for learning rather than short-term memorization of isolated bits of information.

Though change is inevitable, it is rarely easy. At Kennesaw Mountain, we believe that it is much more productive to direct the change in a positive direction rather than be buffeted by random changes we cannot control. To quote the slogan on a Kennesaw Mountain coffee mug: "Life is change. Growth is optional. Your choice." Our teachers chose to change instruction to meet the needs of our students to ensure that they gain the skills they will need to be competitive in a global marketplace. To accomplish this, we needed to change our paradigm for teaching and learning to focus on student achievement rather than teacher delivery and to develop a classroom environment in which instruction mattered more than structure.

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Example of Quadrant D Lesson – Physics in Real Life

Why does the shower curtain blow inward when you take a shower? Why do seemingly heavy objects fly out of the back of a moving pickup truck? The explanation for these and many other phenomena lie in physics, because physics is at the heart of everything. Your semester project for this course is to choose an everyday occurrence from the provided list or from personal experience, and explain it in terms of physics.

Part I. Submit your topic request. This can be just an informal request submitted on one sheet of paper. Only the first person to submit a topic will be accepted, as duplicate topics are not allowed.

Part II. Turn in a two-page (minimum) sheet describing your topic and how you plan to present it to the class. To be accepted, your choice must meet all six requirements outlined below:

1. Type your paper; double spaced, size 12 Times New Roman font.
2. Describe your phenomenon.
3. State the physics principle that explains it. Include which chapter(s) of the book you believe includes this principle.
4. Describe a demo/lab that explores the same principle.
5. List three sources (or more) for your information. Your text does not count. See note below on references.
6. Attach the last sheet of this handout with signatures from you and a parent.

References. Use a variety of sources as you research, not just the Net. Cite these sources according to APA guidelines. The ideal reference page has two parts. One is for Works Cited, for the references you use directly to write your paper, and the other is for Works Consulted, which is for the sources you use to get background information but do not directly incorporate into your paper. You must list at least three sources. Avoid using encyclopedias as cited works.

Part III. Your presentation should be eight to ten minutes long and should include a discussion of the law or principle involved., including any relevant mathematical relationships. As you present use a visual aid, ideally a demonstration, or even a quick lab activity for the whole class to do. PowerPoint presentations or personally made videos are also great just be sure to show relevance and aid in understanding. Be certain that your demo relates to your subject and helps explain your phenomenon. Lab materials will be provided (within reason!).

Suggested Topics

1. How do seat belts and head rests lessen your chance of being injured in a car crash?
2. What is the physics behind a piano?
3. Why are bikes easier to balance while they're in motion than when they're not moving?
4. Why do dark shirts feel hotter in sunlight than light ones?
5. Why do some drivers tailgate or "draft" behind big trucks?
6. Why does the pitch of a car horn change as it passes you?
7. Why do you see a rainbow in a soap bubble?
8. Why is the sky blue?
9. Why does pizza dough flatten as it is tossed?
10. Why are speakers magnetic?
11. Why do golf balls have dimples?
12. Why do oceans have low and high tides?
13. Why are there separate high-altitude directions on some foods?
14. How can a boat made of steel or concrete float?
15. Why do wheels seem to be turning backwards in some movies?
16. Be creative ... have your own topic approved!

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Join with Community in Partnerships

Debra Bishop

Dr. Debra Bishop
is Principal of A.J.
Moore Academy
High School in
Waco, Texas.

Early efforts to meet
and form planning
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to clearly define its
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A.J. Moore Academy, a small urban school of 715 students, can be described as a melting pot. One of the critical beliefs forming the foundation of adult and student behaviors at A.J. Moore is the need for high schools and the business community to work together to provide a challenging, relevant, and focused environment in which students use academics to acquire real-world competencies. While the establishment of such a thriving education community is many faceted, there are specific structures that assisted in the development of the reciprocal relationship between the business community and our high school. These structures include a clear and focused mission, an active business advisory board, career academies, internships, and postsecondary partnerships.

A.J. Moore began as a magnet high school in the Waco Independent School District in 1997. At that time, the focus of the school was not clearly established and close to being declared a failed experiment. During the planning phase of A.J. Moore Academy, employment forecasts were utilized along with information from the Heart of Texas Workforce Commission to determine the future career trends of the Waco community. A planning team was established that consisted of education, business, and parent stakeholders to determine the magnet foci of the school.

The school started with the idea of focusing on engineering and technology, but without a clear vision of how to develop such a school. Early efforts to meet and form planning structures were initially fragmented and largely unsuccessful until the school took steps to clearly define its mission. During fall 1998, the principal and the staff met to determine exactly what the school was designed to accomplish. From this series of meetings the mission was formed: A.J. Moore prepares students to excel academically, intellectually, and socially in postsecondary education and business, as well as in engineering, environmental, or technology careers. While this brief

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description cannot describe the length and difficulty of this process, it was a turning point in the direction of A.J. Moore Academy. High schools cannot be all things to all people. There must be a focus and intentionality in the design, and all stakeholders must understand the mission. Furthermore, business and community members want a clearly focused mission and direction before becoming a part of the school community. The business community desires productive use of its valuable time, and schools can facilitate this process by clearly communicating the mission.

Activating the Business Community

In the early years, A.J. Moore had a business committee that provided input for the school's direction. One of the founding members of the business committee, Dan Hull, CEO of CORD, a Waco-based consulting firm, recommended that the school apply to the National Academy Foundation (NAF) to become a pilot site for the establishment of the Academy of Information Technology. A.J. Moore was selected as one of 12 pilot sites for the implementation of this particular career academy. It was through affiliation with NAF that A.J. Moore adopted a formalized structure for business involvement. The NAF Business Advisory Board structure and design was adopted in spring 1998 and thus began a marvelous journey on the road to rigor, relevance, and relationships.

The components of career academies in the NAF model include:

- an active business advisory board
- an industry-validated curriculum
- internships and job shadowing
- rigor and relevance through focused career electives and an integrated curriculum

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Recruitment of business, community, and education representatives who support the mission of the school is a critical component of effective business and community involvement. Our superintendent worked diligently to garner support from the business community. In establishing Business Advisory Board, representatives from the technology, engineering, business, and education communities were recruited to become members. Recruitment strategies included:

- Informational meetings were set up to recruit business advisory board membership.
- We encouraged founding members of the A.J. Moore business community to help us network through their personal contacts.
- Invitations to informational meetings were mailed to CEOs and presidents of various business and education entities.
- We made presentations to community groups such as Rotary Clubs and the local Chamber of Commerce.

Currently, A.J. Moore has a 65-member business advisory board that meets monthly for one hour and is organized around the following committee structures and responsibilities:

- recruitment
- industry and education
- internships/mentoring programs
- public relations
- fundraising and scholarships

Career Academies

The A.J. Moore Business Advisory Board provides recommendations and guidance in the development of new career academies. With their pulse on the business developments in the community, business leaders help the school to make the right choices based

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on employment and business forecasts for the Waco community. Currently, A.J. Moore has six career academies from which students may choose. Students focus their elective choices in their chosen career academy while meeting Texas graduation requirements on mainly the Recommended or Distinguished Achievement graduation plans. Following are the career academies along with a statement as to why they were established.

- **Academy of Finance:** Recommended because of the need for workers in the banking, accounting, and finance industry both in Waco and throughout Texas
- **Academy of Engineering:** Local, state, and national trends indicated shortages of qualified workers in engineering and engineering-related fields.
- **Academy of Information Technology:** Local, state, and national trends indicated the need for qualified information technology workers at all levels.
- **Academy of Emerging Technology:** This academy focuses on new technologies on the horizon such as nanotechnology, robotics, biotechnology, and fuel-cell technology. A.J. Moore students in this particular career academy take their junior and senior-level emerging technology classes onsite at Texas State Technical College, which is an advisory board member.
- **Academy of Construction Sciences:** Addresses the need for architects and building trades technicians in the Waco area.
- **Academy of Hospitality and Tourism:** Addresses Waco's major push to develop the Brazos River and surrounding downtown area as a major tourism draw, with upscale hotels and shops being developed in an area in close proximity to A.J. Moore Academy.

A.J. Moore has six career academies from which students may choose.

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Internships and Job Shadowing

All information technology academies that are supported by NAF are required to provide students with paid internships during the summer between their junior and senior years. As one can imagine, this can be a daunting task for schools to attempt alone. However, with the support of an active business advisory board, the recruitment and securing of internships for qualified students has been a successful endeavor. Each year in February, two crucial events are hosted by the A.J. Moore Business Advisory Board to assist with the location of internship and job shadowing sites.

Business Advisory Board Recruitment Breakfast

For one such event, the Business Advisory Board Recruitment Breakfast, business advisory board members make contact with prospective new board members to attend a special early morning breakfast to learn more about becoming a business advisory board member. Career academy students display projects, PowerPoint presentations, and other work samples and provide presentations to members and prospects as they tour the displays. The principal and advisory board president make introductions and brief presentations about the school and the role of the advisory board. The superintendent or designee attends to provide district prospective and support. Entertainment is provided by a local band. Business advisory board packets include a brochure and other membership information.

Each year, this event yields several new members and/or internship sites to the business advisory board. This event is critical to the ongoing success and viability of the internship program. However, the internship committee works year-round to identify sites and recruit businesses that will provide paid internships for A.J. Moore students.

A copy of the memorandum of understanding that all parties sign at the beginning of the internship is located at the end of Debra Bishop's section.

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A memorandum of understanding is included in an internship handbook that contains guidelines and information about the A.J. Moore Internship Program.

Job Shadow Day

Each year at the beginning of February, students from all career academies converge on the business community to participate in job shadowing activities. Business advisory board members and other business leaders open their doors to host these excited energetic students. Businesses give tours, presentations, and overall introductions and examples of the world of work. Both students and the business community alike identify this as one of their favorite activities each year. Following are excerpts from the *A.J. Moore Job Shadowing Handbook* provided to all job shadow host sites.

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Goals for Job Shadow Day

- Demonstrate the connection between academics and careers and excite students to learn to make their classroom work more relevant.
- Introduce students to the requirements of professions and industries to help them prepare to join the workforce.
- Enhance community partnerships that strengthen the educational experiences of students.

The Role of Employees Who Will Be Job Shadow Hosts

- Show a desire to work with students and introduce them to the positive aspects of work.
- Have the ability to communicate openly and in a nonjudgmental fashion with students.
- Are capable of linking learning to earning.
- Provide visiting students with explanations of workplace safety and security policies and procedures.
- Help students understand skills needed for the job.
- Demonstrate and explain effective work methods.

Job Shadow Host Guidelines

The following guidelines will help job shadow hosts plan their day before students join them so that everyone gets the most out of the job shadowing experience.

- The student should be greeted as an adult business associate, with a handshake and a warm hello.
- Provide name, job title, and a business card. Let the student know that you volunteered to be a job shadow host because you think it is important for students to see firsthand the application of what they are learning in school.
- Encourage them to ask questions during the time you have together. Explain to the student that a resume is used by employers to gauge an applicant's education and experience.
- Ask to see his/her resume, and then use it as a conversational tool to provide an initial basis for conversation.

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Postsecondary Partnerships

From its inception, the A.J. Moore Business Advisory Board has included members of the postsecondary community in Waco. Current members are Baylor University, McLennan Community College, and Texas State Technical College. Each education entity provides vital support to A.J. Moore.

Baylor University support and participation include:

- guest speakers
- engineering project mentors and panel experts
- business collaboration between A.J. Moore Academy of Finance students and Baylor business students
- scholarships

McLennan Community College support and participation include:

- dual-credit course offerings onsite at A.J. Moore as well as on the MCC campus
- articulated course offerings
- college application assistance
- campus tours
- scholarships

Texas State Technical College support and participation include:

- concurrent enrollment courses aligned to career academies
- curriculum development initiatives for engineering
- certification of A.J. Moore Career Academy teachers as adjunct professors to assist students with earning college courses and certifications
- summer internship and coursework for engineering students
- classes offered on specially designed schedules to coordinate with the semester schedules of the Waco Independent School District
- scholarships

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A strong business community partnership has no doubt made for a richer experience for A.J. Moore students and staff. Yet, the benefits go far beyond the more apparent ones of mentoring, internships, scholarships, and the like. Students gain confidence and a visual picture of what life can be like with the advantages of proper education and training. They have an opportunity to develop networks in the business community prior to graduating from high school that help them move from a life of poverty and hopelessness to one of success and advancement. They see important people giving back their time and effort to help high school students for no other reason than a need to give back and support the community. Thus, these students learn many lessons about what citizenship and community service really mean, from the standpoint of both the giver and the receiver.

The business community has an opportunity to literally touch and mold the future of our community through their guidance. So often we hear words such as: “Great kids, smart, articulate, headed for success.” Finally, the business community has a first recruitment shot at the students in whom they have invested time and money, for after all these students are the future workforce. Smart businesspeople always have an eye toward the future to get a first shot at tomorrow’s talent.

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MEMORANDUM OF UNDERSTANDING A.J. MOORE ACADEMY

AND

Student(s) _____ Summer of _____

I. Purpose

The purpose of this Memorandum is to state clearly the responsibilities of the organization sponsor, A.J. Moore Academy, and the student(s). As partners, each can expect benefits from participation in the Internship Program. Toward the end of the internship, the function of this Memorandum of Understanding is to serve as positive instrument through which those benefits can successfully be realized. It is not intended as a legally binding contract.

II. Responsibilities

A. Responsibilities of A.J. Moore Academy

1. To orient student and employer to the monitoring and evaluation procedures described below.
2. To monitor the placement through telephone and in person contact with employer and student(s) throughout the work period, including a visit to the work site whenever possible.
3. To instruct students and on the job supervisors in the use of evaluation instruments, and to see that they are completed in a timely manner.
4. To provide support necessitated by the off campus nature of the Program, including assistance with job related needs.
5. To make appropriate interventions involving students internship placement when problems occur, including recommendations for altering or terminating employment when necessary.
6. To use its resources and internship expertise to enable students and employers to realize maximum and equal benefit from participation in the Internship Program.

B. Responsibilities of Employer

1. To provide adequate orientation, training, and supervision to students on the job, including a clear communication of expectations regarding performance of the job.
2. To assign productive work that matches student abilities, knowledge, and interests to the extent possible.
3. To participate in the evaluation process.
4. To inform the Director of any potential problems or changes involving student internship placement in a timely manner, so the appropriate interventions can be made.
5. To use the organization's resources and expertise to create a working/ learning environment in which the student can acquire marketable skills and experience and make a valuable contribution to the organization.

C. Responsibilities of Student

1. To make every effort to meet the organization's expectations for work performance, including standards for work quantity and quality, adherence to agreed upon work schedule and other expectations.
2. To make the best use of the learning environment that has been provided by taking advantage of opportunities to acquire skills and knowledge.
3. To participate in the evaluation process.
4. To inform the Director of any potential problems or changes involving the internship placement in a timely manner so that appropriate interventions can be made.
5. To put forth best effort to make a valuable contribution to the organization and to acquire marketable skills and experience at the same time.

Signature of School Representative

Signature of student

Date

Signature of Employer

Date

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Know Your Students, Know Their Strengths, No Excuses

Troy A. McCarley

Troy A. McCarley was formerly Principal of Sam Rayburn High School and is now Executive Director of Secondary Performance and Academic Assistance, Pasadena Independent School District in Pasadena, Texas.

The success of a school is measured by state accountability scores, attendance rates, graduation rates, level of courses offered, and many other attributes. Academic excellence is fueled in the unwavering belief that all students will succeed. “Whatever it takes” are three words that are essential in executing a successful secondary education change at Sam Rayburn High School. A dedicated faculty and staff has turned the phrase “whatever it takes” into an oath of commitment that envelopes the entire high school of 2,300 students.

The first task of successful secondary change is empowering teachers to create their own creed by which they live, work, and teach. An example of this type of creed is as follows. A Sam Rayburn High School teacher is dedicated to the continuous improvement of teaching and student learning through:

- personalizing instruction to meet the needs of each learner
- ensuring that each learner is equipped with the necessary content literacy skills to succeed
- actively engaging all students in meaningful participatory lessons geared toward real life
- facilitating collaborative learning experiences
- challenging and motivating students to excel in a climate of high expectations

Putting these words into action is the key to successful high school change. The most important aspect of teaching is providing personalized instruction in order to meet the needs of each learner.

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Therefore, an administrative team must provide opportunities for teachers to make personal connections with the students and parents they serve. A deeper understanding of student backgrounds must be established during the beginning of the year staff development. An example of an activity that assists in establishing this personal connection is a bus tour in which teachers take a trip into student neighborhoods and observe the apartment complexes, grocery stores, eating establishments, and any other local landmarks that make up the community.

As teachers, many of us have a preconceived image of the home in which we were raised, and we make the assumption that our students' homes are the same. However, for many students, this is far from the truth.

Seeing students' everyday living environments allows teachers to better understand the reason for some of the behaviors, baggage, and issues that are brought to school. The trip is not used to provide an excuse for poor student performance. Education is the key for our students, and we must be the driving force, the road map, and the police officer to help them succeed.

Seeing students' everyday living environments allows teachers to better understand the reason for some of the behaviors, baggage, and issues that are brought to school.

School Motto

The school motto, "Empowering Texans the Rayburn Way," reflects the desire that all students will attain the values of working toward success, practicing citizenship, preparing for the future, and forming global connections for a lifetime of learning. Commitment to excellence through high expectations and goal setting – "The Rayburn Way" – has been adopted by the staff and student body using Rayburn as an acronym:

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R – Respectful
A – Altruistic
Y – You
B – Benevolent
U – Understanding
R – Responsible
N – Noble

Administrators and staff frequently remind students that while their primary goal is to graduate, their ultimate goal is lifelong success.

A “No Excuses” School Culture Is Created

8th Grade Approach

This “No Excuses, Whatever It Takes” approach starts when the students are in 8th grade. As a first step, parent meetings are held in the spring and set the tone for the success of all incoming 9th grade students. This is also the beginning of building relationships and instilling this “no excuses” philosophy in the minds of students and parents. Incoming 9th grade campus visits are coordinated with an introductory discussion by the principal and an elective fair. Students are encouraged to take at least one higher-level class and given the opportunity to preregister for their fall classes. Once they enter high school, many resources are in place to ensure successful transition into 9th grade.

Success in 9th grade is an integral part of the school design. What began several years ago as a single afternoon “fish camp” has turned into Expectation Graduation, a three-year plan for excellence. Expectation Graduation emphasizes to students that the goal is not simply to be successful enough in high school to

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graduate, but to use this time to prepare to become successful in life. Much planning is done by administrators and teachers to turn this drive for excellence into a reality.

Ninth Grade Center

A big part of the 9th grade initiative is the Ninth Grade Center, which houses two assistant principals and two counselors for the freshman class. This administrative team is focused, determined, and will do whatever it takes for 9th grade students to succeed. This often includes home visits, tutoring students, working with parents and teachers, staffing a required lunch detention for incomplete assignments, and many more nonconventional activities.

This “no excuses” attitude also is prevalent with five teams of 9th grade teachers. Each team consists of a representative from each of the core subject areas. All four teachers teach the same students. This team of teachers has a common planning period that provides time to prepare rigorous and relevant cross-curricular projects, discuss student issues, and regularly meet with students and parents when needed. To make the freshman initiative a “no excuses” success, the participating teachers have been relocated within the building to create a 9th grade wing. Freshman lockers are assigned within the area of their team classrooms to reduce the amount of time needed for travel between classes. The principal, assistant principals, counselors, and teachers meet frequently with students to establish student success contracts, which include components of student performance, attendance, and tutoring.

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The Texan Experience

Also, in 2007, Rayburn established a new initiative, “The Texan Experience,” which required all freshmen to begin school one day earlier than the rest of the student body. They began their day with

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a motivational pep rally and orientation session that reacquainted them with the Rayburn way toward excellence. The remainder of the school day was spent participating in team activities to build school spirit and forge new relationships with their teachers and fellow students. The Texan Experience is an incredible experience with students and faculty that sets the tone of high expectations and a positive attitude for the remainder of the school year.

Another successful element of the 9th grade “no excuses” philosophy is a parent “report card pickup night.” An evening is set aside for parents to come to school to pick up their student’s report card, visit with teachers, and, if needed, schedule a time for a conference with all teachers and their child to create a personalized success plan.

A “No Excuses” School Culture Continues

Every school year begins with the principal meeting with all 2,300 students in small groups of 100-120. These are known as student expectation presentations. Highlights from the previous year’s successes are celebrated and discussed. This includes anything from state accountability exam scores and athletics to individual student, club, or department successes. The presentations are concluded by setting the vision for the upcoming school year. Also included in this discussion are the high academic expectations and “no excuses” philosophy regarding behavior, dress code, attendance, and the road to graduation. These talks create a vision and culture of caring and success for all students.

Student Advisory Committee

This culture continues throughout the school year with the help of a student advisory committee made up of 23 students. To gain various student perspectives, the committee includes high- and

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low-performing students, as well as average-level achievers. The committee meets regularly to discuss campus instructional issues and ways to support students so that they can be successful.

A “no excuses” library success initiative was established when a student commented at one of these meetings that the student body would use the library for homework and research more if the library were open for extended hours. Because of this conversation, the library now has extended hours to encourage all students to optimize the use of the library’s resources. From this one change, the library is now a hub of working students who are dedicated daily to completing their assignments.

Campus-to-Home-Attendance Mentoring Program

Campus-to-Home-Attendance Mentoring Program (CHAMP) visits are made weekly to the homes of students who have three or more days of absences. Thirty-four teachers volunteer their time after school and in the evenings to make these visits possible. Home visits strengthen the personal connections with the school and send a strong message to parents that the faculty cares about each student.

During these meetings, student attendance contracts are signed by students, parents, and teachers to signify a commitment to school attendance. Faculty members who go the extra mile for students build trust and positive relationships with these students and parents, while signaling to the students that absences from school are monitored and will not be allowed.

Supporting Academic Success

Sam Rayburn teachers and administrators understand that getting students involved in clubs, organizations, performance electives, and athletics is key to academic success. Students at Rayburn are able to select from a variety of classes to improve their abilities and increase their interest in school. Personalization of instruction and academic interventions are available to students in the following ways:

Campus-to-Home-Attendance Mentoring Program (CHAMP) visits are made weekly to the homes of students who have three or more days of absences.

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- AVID (Advancement Via Individual Determination): At-risk students agree to enroll in advanced-level classes with tutoring support. They are taught organizational skills, test-taking strategies, note-taking skills, vocabulary-building exercises, and attend field trips to colleges and universities.
- Math, reading, writing, and science computer labs provide students with opportunities for practice in order to increase their skills.
- State accountability tests classes are built into the daily schedule. After-school tutorials, pull-out programs, and Saturday tutoring and makeup assignment meetings are issued to students who need extra time and incentive to complete their work.
- GAP (Graduation is A Possibility): After-school classes are held for students who have failed a course or have a poor attendance record.
- The JROTC program encourages students to practice discipline and citizenship; they are taught to “lead by example.”
- Scholastic’s *READ 180* program assists struggling students in sheltered English classes to improve their reading skills.
- Culinary arts classes allow students to experience the art of food preparation by planning and preparing meals for the faculty and special events in Rayburn’s own restaurant, “The Blue Room.”
- Extra tutorial support for students is provided by the National Honor Society. Members tutor in the library before and after school in all subjects. Teachers also provide tutoring before and after school and during their conference periods.

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- An Advisory Period has been established within the school schedule. Goal setting, regular grade, attendance, and graduation credit conferences are held during this time. Additionally, teachers lead classes in topics including organization, vocabulary enhancement, reading improvement, and self-esteem building.
- A fully functioning Credit Union is on campus as a school business partnership with the intention of teaching early financial education. Students learn about various account types, how to establish credit, and how their decision making affects their financial future. The tellers at this branch are current students enrolled in the Distributive Education program at Sam Rayburn.

Students have an opportunity to participate in a multitude of other extracurricular and co-curricular activities. The philosophy is that academic success comes first and extracurricular and co-curricular activities come second. The coaches, sponsors, and teacher leaders continually require grade checks, ongoing communication with teachers, and assign mandatory tutoring if students are failing classes. A continual monitoring process is critical for the success of all students.

Looking Forward to Higher-Education Opportunities

Rayburn has a college center for students and parents to inquire about colleges, entrance requirements, and scholarships, as well as to obtain answers to any other questions related to college.

College Night, hosted annually for all students and parents, provides an opportunity to visit with representatives from more than 80 colleges and universities. Information concerning SAT and ACT test scores, credit requirements, available scholarships, and financial aid are also addressed. A full-time scholarship coordinator works with seniors on numerous scholarship and grant opportunities. The

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unwavering determination by the counselors and the scholarship coordinator to locate funds that will further the education of students results in graduates earning millions of dollars in scholarships each year.

Getting the “No Excuse, Whatever It Takes” Message to Students and Teachers

The following factors are the most significant in creating, maintaining, and ensuring this philosophy:

- The principal is the messenger of policies of change; however, positive change will only occur when all faculty, staff, and students are on board and working together.
- Positive change takes time. Taking small steps will ensure success and ownership. A leader must be encouraging and supportive to any faculty and staff who are hesitant to believe in the school's vision.
- As principal, you must be willing to do whatever it takes for student success. Make sure you are actively involved in everything you ask your teachers and students to do to bring about change.
- Relationships must be fostered, created, and nurtured with all faculty, staff, students, and parents. These positive relationships are critical in building rapport with all stakeholders; everyone involved must have trust and vision to see a change as worthy.
- A critical aspect of change is to consistently reward, highlight, and showcase every positive step toward the end result of success. Remember, no gain is too small to be celebrated, and everyone appreciates a thank-you for a job well done.

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- Every decision, conversation, and action must have the students' hearts in mind. As the saying goes, "We must teach from the heart."
- Teachers, students, parents, and all stakeholders must be reminded to maintain high expectations, especially during times of implementing change. An attitude of "no excuses, whatever it takes" must be lived by every teacher, and a true passion for improvement should be felt by all.

A principal's enthusiasm, altruistic attitude, and personal involvement with students and staff are the catalysts to sustainable change. Whether they are riding a mechanical bull, shaving their head, or camping on the top of the school in support of the student body, successful principals who are "change agents" must exceed all expectations of the typical high school principal. They must care from the heart and make sure it shows.

Jefferson County, in east central Georgia, was once a complacent place that was comfortable with the status quo of small rural schools. All this changed in 1995, when Jefferson County High School (JCHS) formed from the consolidation of three high schools. To justify the closing of the neighborhood schools, the community demanded that the replacement school would have to be greater than the sum of its parts (the three high schools). The new faculty, staff, and administration were obligated to conduct a rigorous self-evaluation.

What was found was a serious achievement gap among high school students. The highest achieving students (20%) performed remarkably well in school and on standardized tests. These students entered prestigious colleges and universities, but they did not return to live, work, and raise families. Another group (10%) joined the

Live Lofty Expectations

Molly Howard

Dr. Molly Howard is Principal of Jefferson County High School in Louisville, Georgia. She was selected as the 2008 High School Principal of the Year by NASSP.

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military or attended area technical schools. The largest group (70%) graduated, stayed at home, and repeated the cycle of generational poverty and an under-educated population. At the time JCHS was constructed, more than half of the county's adult population lacked a high school education.

It was obvious from the beginning that the school would have to conduct business in a new way. With the construction of a new building, the opportunity existed to make dramatic changes in the way students were educated. However, this change would not happen just because of a new building or because three faculties were joined together. Rather, the type of change that was demanded would require leadership, determination, much hard work, and most of all, higher expectations.

Laying the foundation of a shared belief that *all* students can learn at high levels was the hardest work that had to be done. "All students can learn" is easy to say but harder to actualize. School leaders recognized that all other work would be futile, or at least less meaningful, if all students were not valued equally. Through meaningful dialogue and self-evaluation, it was revealed that many staff members qualified the statement regarding all students with "if" statements such as "if they have home support," "if they want it bad enough," or "if they do their part."

Changes in attitude cannot be mandated, but changes in practice can and were. The school improvement team and other school leaders realized that movement toward the vision for the new school could not be put on hold until everyone truly believed in the articulated goals. The school's leadership held the belief that changes in practice would beget change in beliefs. This proved to be true and was the catalyst for initiating change.

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Much of this change had begun prior to the High School Reinvention Symposium, sponsored by the International Center for Leadership in Education in October 2005. However, it was during the symposium that we were able to both validate our thinking and use the information we gained to inspire additional changes. We knew, for instance, that “good data is a necessary ingredient in any restructuring initiative,” and we continue to make data-based decisions in all areas of school improvement. An unwavering focus on instruction also was central to laying the foundation for the shared belief that all students can learn at high levels.

With the help of our special education resource teachers, we began our planning by considering the needs of the hardest-to-serve students, knowing that what was sound and effective instructional strategy for our most struggling students would be beneficial to all. Higher expectations for all meant little without the requisite of meaningful relationships that would allow students to trust us and feel personally important and valued. Through our advisory program, we were able to pay more attention to the transition years, grades 9 and 12. The unofficial but often spoken goal for 9th grade advisors reflects their high expectations: “Every 9th grader this year will be a 10th grader next year.” Finally, woven throughout the changes that reflect our high expectations for all is a “systems approach” to change. We aligned our actions and responsibilities; we created ways to share responsibility for student learning; and we reflected on the role of leadership at every level of the school.

Laying the foundation of a shared belief that all students can learn at high levels was the hardest work that had to be done.

Closing the Achievement Gap

To close the achievement gap among JCHS students and implement a rigorous curriculum for all students, the School Advisory Council examined and then adopted, with faculty approval, an increase in the number of units required for graduation. An instructional team

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designed a plan to increase rigor in the curriculum through more advanced courses. Systematically, all lower-level courses were eliminated and all core academic courses are now taught at the college preparatory level. Advanced Placement (AP) courses were made available to all students who wished to enroll.

Raising expectations, however, is no guarantee that students will be able to make the additional leap. Structures – instructional scaffolding – were necessary to allow students to approach the goal in smaller, more accessible steps. Departments provided extra help in a myriad of ways, including after-school tutoring that, in some departments, was laser-focused on each student's instructional needs. Perhaps the greatest testament to the change in expectations was the schoolwide acceptance of the inclusion model for serving students with disabilities. With the right structures in place, students who might not have been expected to perform well in the past were expected to perform, and did perform, in the regular education classroom.

Experience with these changes precipitated more changes at JCHS. Keeping more students in school, including more students in regular education and AP classrooms, and eliminating lower-level classes meant adopting a new attitude toward the completion of work. If we were truly to expect all students to achieve the standards, we had to adopt a “not yet” philosophy toward student work that was not acceptable but which could be if the student continued to work on the assignment or task. To that end, we created common course syllabi and common course assessments. What it took to show proficiency in one section of a course had to be the same as what it took in all the other sections of the course. Additionally, we required weekly writing in all courses so that all students would be given opportunities to articulate their knowledge and understanding. Most recently, we have added reading in the content areas to our

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instructional initiatives. We realized that our students were not improving their reading skills because we failed to expect them to read.

Prior to these changes, many teachers said they had high expectations for all, but very few really knew what those expectations looked like or they unintentionally communicated that low expectations were acceptable for some. Here is what high expectations look like now at JCHS.

Raising expectations is no guarantee that students will be able to make the additional leap. Structures – instructional scaffolding – were necessary to allow students to approach the goal in smaller, more accessible steps.

Elimination of Lower-Level Courses

JCHC does not allow a student's past performance, socioeconomic status, or race to serve as a justification for failure. Instead, we focus on helping all students meet the universally high expectations. JCHS has eliminated tracking and almost all remedial courses. Today, all 9th grade students begin their core academic program with college preparatory English, mathematics, science, and social studies, and this program continues through 10th grade. For 11th grade, students enroll in either college prep or honors English courses. For 12th grade, students choose college prep or AP English. Our language arts, science, social studies, and math departments employ heterogeneous grouping in 9th and 10th grades. Students are allowed to choose electives in grades 11 and 12.

More recently, we delved into the reading problems that plague many of our students. Research clearly indicates, as does common sense and the anecdotal evidence, that students who cannot read at the appropriate level of proficiency are handicapped in all areas of the curriculum. We were committed to eliminating the remedial and basic reading courses that did not serve as adequate substitutes for the language arts classes taken by the general population. Instead,

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our research turned us toward Scholastic's *READ 180*, a program that allows students to master the standards of 9th grade language arts while providing direct, explicit reading instruction.

Our math curriculum also needed to be purged of lower-level courses. Some students entered prepared for Algebra I, but many others did not. Consequently, dozens of students failed Algebra I courses. Knowing that Algebra I is fundamental to the success in any college preparatory math course, the math department restructured the requirements through an innovative program called Algebra That Works. The purpose of the program is to provide a structure that communicates high expectations for all students and allows them the necessary time to develop and demonstrate true mastery of essential algebra skills.

Though the state requires an algebra credit for high school graduation, students had been allowed to fulfill the requirement by taking either a traditional Algebra I course or three basic math courses equivalent, in principle, to Algebra I. We realized, however, that these three weak courses were not in fact equal to Algebra I.

JCHS has eliminated tracking and almost all remedial courses. Today, all 9th grade students begin their core academic program with college preparatory English, mathematics, science, and social studies.

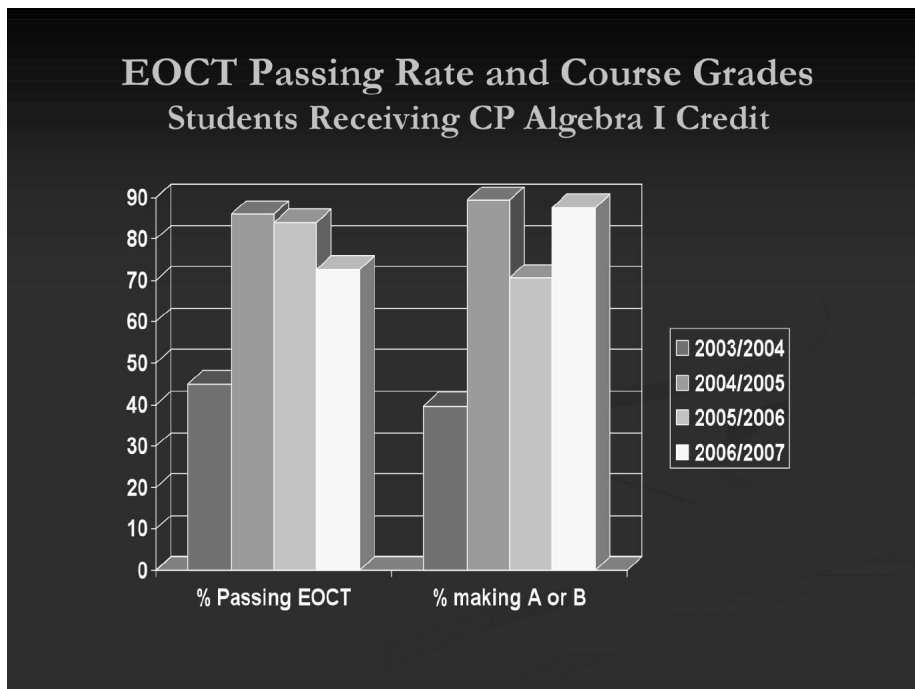
In the Algebra That Works model, Algebra I is broken into four units, with each unit covering 6-8 specific standards. Two units are covered every nine weeks. These units are called modules. Students must show proficiency in a module before moving on. Students not mastering a standard with at least 80% receive an incomplete for that standard and are given an opportunity to make up the incomplete. Students who have not mastered standards are offered extra help opportunities through an after-school tutoring program and are scheduled for an in-class retest. A second retest opportunity is made available before or after school if mastery still has not been achieved. In order to take any test, students must be present in class, have all homework assignments for that module completed, and complete the in-class and/or tutorial review sheet

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with all work shown. Because it is crucial to make additional help available to students, after-school transportation is provided.

The following chart shows the impact of the mastery model on the end-of-course test pass rate and course grades.

Knowing that Algebra I is fundamental to the success in any college preparatory math course, the math department restructured the requirements through an innovative program called Algebra That Works.



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Inclusion Model for Students with Disabilities

JCHS believes that innovation should be the result of creative problem solving, not mandates from beyond. It did not take a long hard look for us to realize that, despite our best intentions and true desire to love and meet the needs of our special education students, our pull-out structures represented less than high expectations for this group of students.

When the school made the move from self-contained, resource classrooms and other pull-out models for students with disabilities and began to provide every student access to the general curriculum, there was no turmoil or objection from content teachers. It just made sense with the internalized belief that *all* students can learn.

Students with special needs have been taught in regular education classrooms as much as their disabilities will allow for a number of years now. The regular education and special education teachers collaborate and team teach in both academic and career/technology classes, each bringing their own expertise to the learning environment. Not surprisingly, the achievement levels of these students have soared. Students who many never expected to pass graduation tests or other measures of academic accomplishment now regularly meet and sometimes exceed these goals.

Establishing a System of Extra Help

To simply raise the bar by eliminating lower-level courses did not ensure that students would perform at higher levels. Instructional scaffolds were erected so that students could climb to higher levels one step at a time. Support structures and safety nets were set up to catch any student who might fall or lag behind. In the math department, for example, extra help opportunities are made

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available through after-school tutorials that are laser focused in their prescription for remediation. After the student has completed the prescribed remediation, he or she is able to take a scheduled retest with the math teacher. A second retest opportunity is made available before or after school if mastery still has not been achieved. Extra help opportunities for struggling readers are provided through a prescriptive reading program from Scholastic called *READ 180*. Students who read below the fourth stanine (level of aptitude) are placed in a reading class at the beginning of the school year that provides direct reading instruction in the fall. In the spring, the students follow the curriculum for college prep English while still receiving direct, explicit reading instruction using materials from all curricular areas.

Creating Common Course Syllabi

One of the first strategies employed to ensure that all students would be taught to the same high standards was the creation of common course syllabi. Several teachers from JCHS attended a workshop on high expectations where the value of good course syllabi was discussed. The teachers realized that a good syllabus is more than just a list of rules and regulations for students to follow. It should be a road map from the teacher that outlines the steps to success for the class. It is a valuable communication tool for the teacher to the student and the parent. A successful syllabus communicates to students what the course is about, how it fits into the curriculum, and what will be required of the students to earn an A or a B. It is a contract between students and teachers to ensure quality work. To prepare teachers to create effective syllabi, examples of exemplary course syllabi were provided. The following template was created to assure that each syllabus contained the necessary components.

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Syllabus Checklist

	YES	NO	N/A	Not Clear	Comments
General Course Information:					
• Course Title					
Instructor Information:					
• Name					
• Phone number/voice mail					
• Best conference times					
• E-mail address or Web page					
Texts:					
• Textbook					
• Additional materials					
• Computer needs					
Course Description/Objectives:					
• General course description					
• Prerequisites					
• Topics to be covered					
Instructional Philosophy					
• Expectations student performance					
• Emphasis: (laboratory, lecture)					
• Collaboration					
Individual work					
Group work					
Outside resources					
Major Course Projects					
Project Outline					
• Objectives					
• Requirements					
• Evaluation					
Instructional Delivery Plan					
• Distribution of syllabus					
• Safety guidelines/procedures					
Class operation					
• Teacher responsibilities					
• Student responsibilities					
Assessment Plan					
• Performance standards					
• Student evaluation					
Daily participation					
Projects					
Tests					
Quizzes					
Required reading					
Field trips/excursions					
Homework					
Final examination					

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Common Assessments

A natural next step to the elimination of lower-level courses and teaching all students at the college prep level was to create common course assessments. Teachers from each course discipline worked collaboratively to create departmental exams. This process assures that all sections of a course contain the same goals for student learning. The items on these exams are aligned to key standards covered in the course and are designed to ask higher-level questions instead of basic recall. Teachers use the assessments not only to ensure that all students are taught to the same level, but also to assess whether or not the curriculum is clearly aligned to the standards. Teachers use the information from the standardized tests to modify curriculum as needed. The data collected from careful examination of these tests enable teachers to determine weak areas in the curriculum and where remediation is needed.

Common assessments in the science department have been expanded to include “testlets,” small formative assessments on each standard. Teachers evaluate student performance on each testlet and provide immediate remediation before moving to the next standard. Similar to Algebra That Works, students are not allowed to move to the next standard until they have mastered the current one. This may involve an after-school tutorial if only a few students need remediation or whole class instruction if the entire class did poorly. Inclusion teachers sometimes use the pull-out model to provide remediation to students who need extra practice on the standard. The social studies department has recently adopted the testlet model of formative assessment, and other departments are trying to adapt this model to their curriculum as well.

To deepen students’ understanding of subject matter, the school implemented an initiative that required weekly writing in all classes.

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Writing Across the Curriculum

To deepen students' understanding of subject matter, the school implemented an initiative that required weekly writing in all classes. To prevent teachers outside the language arts department from feeling intimidated by the requirement, the instructional coaches and language arts teachers created a "writing across the curriculum" guide to help them with this new requirement. Staff development was also provided that explained the reason behind the initiative and provided research to support it along with suggestions of how each department could implement it.

Teachers were required to include writing in their lessons at least weekly. They had to identify the kind of writing, instructions for writing, and an explanation of how it would be assessed. They also had to evaluate the success of the assignment and note any thing they would do differently. Many teachers found that requiring students to write about what they know in a particular class was an excellent way to assess their understanding of the material taught.

Reading Across the Curriculum

The next step toward schoolwide literacy was to incorporate a reading requirement across the curriculum. Teachers participated in staff development that provided research on the need to read in all academic areas, and they were provided with tools to help them implement reading in their classrooms. Instructional coaches met with each department to share strategies for teaching reading in specific content areas. Instruction was given on ways to engage students before, during, and after reading. Teachers were required to incorporate meaningful academic reading in their lesson plans. Similar to writing across the curriculum documentation, they had to designate before, during, and after strategies to engage students in the process.

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Expanded AP Offerings

JCHS currently offers seven AP courses, up from just three two years ago. For years, we offered AP English Literature and Composition, AP English Language and Composition (one section of each), and AP Calculus. We expected only a handful of the school's highest achieving 12th grade students in the limited areas of math and English to be successful in AP courses.

We had to believe in and expect more of more students. Our first action was to resurrect a dropped AP U.S. History course. We had interested and capable 10th grade students and an interested, though untrained, social studies teacher. In order to support the novice AP instructor, we tapped into the Virtual School resources provided by the state of Georgia. Using a blended model, the instructor facilitated three days of Virtual School instruction in the media center computer lab and provided direct instruction for two days in the classroom. This year, AP U.S. History depends far less on the Virtual School Web site but still utilizes many of the technological resources. Grant money from the Governor's Office, specifically for the development of AP programs, provided the funds to add still more AP courses. During summer 2007, three new teachers attended weeklong AP workshops sponsored by the College Board. Thus, this school year we were able to offer AP Studio Art, AP Chemistry, and AP Spanish.

We had to believe in
and expect more of
more students.

The JCHS 4x4 block schedule permitted a scaffolding of the new AP courses. This meant that students enrolled in AP Calculus, AP U.S. History, and AP Chemistry during the spring block had successfully completed pre-calculus, non-AP U.S. history, or chemistry during the fall block. We use many strategies to encourage participation

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and search for students who might be “diamonds in the rough.” Our recruitment is for those students who are willing to take the challenge. Our method is to nurture students and embolden them to challenge themselves and produce the highest-quality work possible. Our hope for future years is to offer more course opportunities and recruit more student participation, especially among historically disenfranchised minority groups. We are confident that the implementation of these goals will increase overall student achievement in AP courses.

Increasing Graduation Requirements

Because JCHS is on a 4x4 block schedule, students are able to earn 32 units over the course of four years. To support our philosophy of high expectations, we increased the graduation requirements from 24 (the state requirement) to 28. This sent the message to students, parents, and the community that a JCHS education is much more than the minimum standards. All college- and career-bound students are required to earn four credits in college prep English and three credits in math and science. Students taking college prep courses are strongly encouraged to take calculus and AP English. Career-bound students must earn at least four credits in a vocational major, and at least two credits in related vocational or technical fields. College-bound students also are encouraged to earn certifications in vocational areas as well. The state has plans to eliminate the two programs of study in favor of universal graduation requirements beginning with incoming 9th graders. Years of work eliminating lower-level courses, offering additional electives, providing extra help structures, and tweaking the curriculum have allowed our school to be perfectly poised to adapt to the state’s higher expectations for all.

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Measure of Success

Administrators and instructional coaches have seen firsthand the positive changes that have resulted from higher expectations for all. Their observations have revealed that students are actively engaged in work that is rigorous and relevant and that teacher instruction is more focused than ever before. Teachers are seeking ways to make the work more meaningful to the students. Administrators have also commented on the increase in professional conversation that they hear among teachers. They see teachers working diligently to reach every student every day. The roles of administrators and teachers have changed, and teachers many times ask administrators and/or instructional coaches to visit classrooms and offer advice. The positive impact of these changes is perhaps best seen in our graduation rates over the past several years. The following table demonstrates a steady sustainable increase in the graduation rate overall, as well as for the major subgroups: African-American, students with disabilities, and the economically disadvantaged.

The roles of administrators and teachers have changed, and teachers many times ask administrators and/or instructional coaches to visit classrooms and offer advice.

Jefferson County High School Graduation Rates				
	All	African-American	Students w/ Disabilities	Economically Disadvantaged
2007	77.6%	74.4%	44.8%	75.4%
2006	74.5%	75.8%	36.8%	75.0%
2005	66.0%	64.1%	43.5%	66.5%
2004	63.2%	58.1%	16.7%	57.8%

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Moreover, the data indicate that the percentage of students scoring in the highest category of the Georgia High School Graduation Test continues to rise. In addition, the emphasis placed on writing in every content area is reflected in continued increases in the writing component of the Georgia High School Graduation Test. Last year 89% of the students passed the writing component on the first try.

Georgia High School Graduation Test												
	2000-2001		2001-2002		2002-2003		2003-2004		2004-2005		2005-2006*	
	All	Pass Plus	All	Pass Plus	All	Pass Plus	All	Pass Plus	All	Pass Plus	All	Pass Plus
English LA Total	89%	32%	91%	39%	90%	58%	94%	51%	93%	51%	89%	51%
Mathematics Total	83%	27%	82%	31%	84%	34%	89%	37%	88%	29%	83%	40%
Social Studies Total	54%	11%	62%	14%	66%	21%	63%	16%	72%	21%	71%	17%
Writing	82%		76%		77%		80%		85%		89%	

**2005-2006 results are of the Enhanced Georgia High School Graduation Test – a more demanding assessment than in previous years.*

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Students recognize the positive changes as well. Rubrics that outline academic expectations for student products and performances have become second nature to them, and they are not afraid to question the teacher to see if their grade is an accurate reflection of what is conveyed in the rubric. When observers enter the classroom, students are no longer inquisitive about the purpose. They are so accustomed to visitors that they frequently offer to show the observer their work and to comment on the kind of work they are doing. They realize the rigor and relevance of their assignments, and they know that they are being better prepared for college. Students realize that teachers care about their learning and they are willing to do anything to help them learn. In a recent survey, 86% of students say that JCHS is a welcoming school. This is up from 63% the previous year.

Parents also recognize the positive changes in the school. In a recent survey, 96% of parents say that their children are given challenging work at school. They also noted in a recent survey that JCHS is a warm and welcoming place. Many have commented that because of our student advisory program, they are visiting the school for the first time since their children started kindergarten. They feel more comfortable seeking out teachers and discussing what is best for their children.

Summary

The road ahead for Jefferson County High School will continue to be a challenging one — one that requires our ability to be sure of our destination: success for all children. We must continue to make meaningful and goal-focused change. That change must include the following actions.

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- Drive the use of best practice even deeper, more consistent, and more pervasive.
- Provide more coaching and assistance to veteran and new teachers.
- Improve skills and practice of looking at student work to ensure that it is high quality.
- Refine assignments, always keeping the focus on rigor and relevance.
- Develop increasingly personalized relationships with all stakeholders, most especially with students.

As noted earlier, laying the foundation for higher expectations was the most difficult work of all. We needed to omit the qualifiers on student success and not merely hope our words and wishes would be enough. Hope is not a strategy, and actions still speak louder than words. High expectations can and should be seen in the daily operations of a school. JCHS can now point to the evidence of our high expectations in both practice and student achievement.

Measure Learning by Proficiency

Kathleen Weigel

Dr. Kathleen Weigel
is Principal at Atlantic
Community High
School in Delray
Beach, Florida.

Proficiency is more than recall of information and certainly more than showing up for class and just following the rules. Proficiency means that a student can take any given problem or situation, process it, analyze it, and more important, take action on a practical level to solve the problem. Proficiency is mastery. True mastery displays the students' performance — skills, abilities, and aptitudes in any given curricular area. This is measured by performance assessments, not traditional multiple-choice examinations.

The definition of proficiency took on new meaning in our school when we embraced the notion that we wanted true rigor and relevance at our school. We began with the teacher leadership team discussing with the faculty what rigor and relevance meant in the curriculum. However, we found that when the theory of rigor and relevance had to be operationalized in a large, urban school, we had more work to complete.

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What Is a Grade?

Very quickly, faculty conversations focused on the awarding of grades to students. We began to explore grading issues and proficiency more deeply when we realized 30% of our students were not graduating. We knew these students; they were smart, bored and disengaged. They weren't necessarily kids that had behavioral issues. They just couldn't jump through the "right hoops." It was clear that our teaching methodologies were not reaching them. They were kinesthetic learners. They were students who needed to be assessed in a different modality.

At the time, all we did was award grades through paper-and-pencil recall tests. Students had to sit for an exam and fill in the bubbles for the answer. There were very few projects being done. When we compared this situation to our successful International Baccalaureate (IB) program, we noticed the IB assessments did not have multiple-choice assessments, but incorporated authentic assessments that encouraged thinking, innovation reflection, project completion, and portfolios. We asked ourselves why we couldn't apply the same high-quality assessments to all student learning.

In our analysis, we found that, for their own convenience, teachers limited the way they assessed students. This realization was the impetus of hard conversations in which we had to ask two important questions: "Why are our students failing" and "What exactly is a grade?" However, when we really analyzed what we were doing, we found out the grades, the thing we really thought was affirming knowledge proficiency, were the very thing that was eroding the confidence of many of our students. Our grading practices went against our goal of helping every student reach academic excellence.

As part of the new grading policy, our teachers came up with "I" contracts. These contracts state that a student must complete specific work to demonstrate proficiency.

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New Grading System

These hard conversations have led to a new grading system. Teachers devised an A, B, C, I, F system in which “I” stands for incomplete. The new letter replaces the D, a “mercy” grade sinks a student’s GPA. The old system did not spur students to work harder to improve; it made them work less and become bitter about school.

As part of the new grading policy, our teachers came up with “I” contracts. These contracts state that a student must complete specific work to demonstrate proficiency. When the I contracts were first implemented, the teachers fell into the trap of having students make up all of the work that students didn’t complete. Teachers now handle the contracts much differently. Students are required to demonstrate proficiency, not complete endless worksheets and an arbitrary amount of seat time.

In our current grading system, a grade of C is the threshold. This was determined after investigating the grading policy for a local university’s graduate program. Teachers also determined that everybody learns at a different pace. This means that some students’ education journeys toward proficiency move along faster than others, as will the path to mastery. By giving the students who need more time to master the content an I, the teachers are giving them the power to learn at their own pace to meet proficiency standards. This doesn’t mean that the teachers are “giving” grades. This would be an unethical practice. The teachers are providing students the time necessary to develop skills and demonstrate content mastery.

A component of the new grading policy is called “I on the fly,” which is nothing more than good teaching at its best. In an “I on the fly” classroom, a student hands the teacher something that is determined to be below proficiency standards. The teacher returns

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the work to the student with suggestions on what he/she can do to improve it. The student improves the work and turns it in again, and then it is graded. Students understand the “I” on a paper, for all of their teachers use it as a tool to attain proficiency in a content area.

Replacing the D grade with an I has created a very different climate for student work and proficiency in our school. Teachers are thinking more critically about what high-quality work is and not just assigning routine busywork. Students take the work more seriously, and it is often more interesting and challenging. Best of all, students are attaining good grades and becoming closer to the prize of graduation.

With this new grading system, working toward proficiency resulted with exhausted teachers after the first semester. While we knew this process would not be easily implemented, the teachers weren’t supposed to be exhausted. After close analysis, we found that incomplete homework was sinking our students. This led to an analysis of our homework policies. It didn’t take long for our teachers to realize that when a homework assignment was given, there weren’t parents at home to assist them in the completion of the assignment. Moreover, many of our students have jobs to go to or take care of siblings after school. Sometimes students are so active in after-school activities that homework was not reasonable for students to complete.

We didn’t throw out homework totally. We made it meaningful rather than allowing it to be perceived as busywork. This change was monumental for teachers as well. We found that our teachers were exhausted because they thought they would have to have the student make up all of the assigned homework. What the teachers did was streamline the process so that, instead of having students make up five incomplete assignments, the students completed one assignment that demonstrated proficiency in the material covered in the five assignments previously given.

SAMPLE I CONTRACT



To the parent/guardian of _____:

As a student in the Atlantic Community High School in 11th/12th Intensive Reading, your child, _____, is expected to perform at a level which merits a grade of C or better on the report card in each course. This letter is to inform you that your child has failed to meet the requirements for achieving such a grade in one or more of his/her classes. He/she has received a grade of I, which stands for "incomplete." It is important to note that Is will automatically become Fs if the student does not complete all make-up requirements within a certain period of time.

There is a specific procedure associated with removing grades of I from the student's record; see the following checklist for the requirements. Please recognize that the responsibility for completing this checklist belongs to the student and his/her parent or guardian.

Thank you for your support. Feel free to contact your child's teachers at 555-5555.

Sincerely,
11th/12th Intensive Reading Teachers

1. Parent letter returned and signed. Complete ____ Date/time: _____
2. After-school tutoring in media center Tues/Wed. Complete ____
(Requires signed check-in sheet.)
3. Completed ALL work assigned by teacher(s). Complete ____
4. Completed within appropriate time frame. Complete ____
(1 "I" – 2 weeks; 2 "I"s – 3 weeks; 3 or more "I"s – 4 weeks)

Please return a copy of this letter signed to indicate that you understand the process.

Signature

Date

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I Contract: Make-Up Work

Intensive Reading 11th 12th grade

Due date: _____

All requirements must be met by the due date for a grade change to occur.

REQUIREMENTS:

Proficiency must be met in the following areas:

- Main idea/identifying relevant details
- Author's purpose/Author's point of view
- Context clues – how to use the clues to find meaning of unknown words
- Distinguishing between figurative and literal language
- Cause-and-effect relationships
- Compare/contrast relationships
- Reading informational text (graphs, charts, maps)
- Search and destroy test-taking techniques (preview, marking, text, chunking, and marginal note-taking)
- Test-taking strategies (eliminating, paragraph labels, identifying question types)
- Drawing conclusions/inferences
- Vocabulary strategies (how to break a word apart)
- Reference and research skills (evaluating and analyzing information)
- Writing skills – responding to literature
- Endurance in a passage

POSSIBLE ASSIGNMENTS:

- Portfolio
- Create a video to demonstrate proficiency
- Create an assessment test with an answer key
- Utilize NHS tutoring
- Newspaper activity – use the newspaper to practice skills
- Practice skills in a reading passage
- Create a game utilizing your weaknesses
- Create your own newspaper
- Oral demonstration of proficiency
- Reading logs
- Utilizing Q-cards to create questions
- Utilize technology programs providing documentation (Princeton Review, FCAT Explorer)

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Another grading practice that we eliminated was the use of zeros. A zero sinks the student's average so deeply that there is no impetus for him or her to do any better.

Elimination of Zeros

Another grading practice that we eliminated was the use of zeros. A zero sinks the student's average so deeply that there is no impetus for him or her to do any better. Again, there is no proficiency piece present, if a zero is a current grading practice. Teachers utilize the "I" instead of the zero. If students are afforded this chance to make up work, things happen, discipline improves, and students are encouraged to perform. Just by eliminating zeros and implementing Is, we are seeing a maximum difference in the performances of students. Likewise, by eliminating the D grade, students either show proficiency and get the C or they receive an F. Students can still fail. However, we are committed to ensuring that failure is not an option. At the first sign of failing a class, students immediately go into a credit-recovery program, which doesn't let them fall behind. In these credit-recovery classes, which do not lock in time restraints, students must show proficiency according to the academic program before they are allowed to move on.

Improved Student Results

The results of these changes in grading practices are remarkable. Attendance for students and teachers has improved greatly. All students are on grade level, having the right amount of credits and a healthy GPA. Their next hurdle is passing the state FCAT test, taking the ACT, and/or taking the SAT. The conversations are about getting their diplomas and going to college or technical school. Prior to these changes, we had dozens of students falling behind.

The local junior college now comes to our school in April to register every one of our seniors. So, we can say that our students now have a better chance of going to college and their future is much more hopeful.

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The “inside-out” approach to personal and interpersonal effectiveness means to start first with self; even more fundamentally, to start with the most inside part of self [to deal] with your paradigms, your character, and your motives. The inside-out approach says that private victories precede public victories, that making and keeping promises to ourselves precedes making and keeping promises to others. It says it is futile to put personality ahead of character, to try to improve relationships with others before improving ourselves.

Stephen R. Covey, *The Seven Habits of Highly Effective People*

On April 21, 1999, before the school day began, a high school senior came into the office where I was working as principal at Watkins Mill High School in Montgomery Village, Maryland. He pulled my arm and moved toward the office door. Outside stood four cameras with TV reporters from the Washington, D.C., metropolitan area major network news teams.

As I approached the cameras, a reporter asked, “Mr. Martinez, your school demographically is a lot like Columbine High School. Tell us what you are doing in the wake of the events yesterday at Columbine.” My response was immediate. “We’re not doing anything in the wake of Columbine.” From there, we invited them to talk to students who were coming into the school to begin the day. The words that students repeated frequently during those conversations were “respect,” “safety,” “welcoming,” and “treated as a person.” Those words, emanating from student voices, said more about our school than anything I could have offered to the media.

As a result of those newscasts, I was invited as a keynote speaker during the opening day for elementary teachers in one district over from Columbine High School. What was so telling in this district community were the walled and gated neighborhoods surrounding the schools. Two of the teachers in the audience that day told me

Nurturing Positive Relationships

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during breaks that they wanted to make sure that their classrooms provided the safety and freedom for children to be able to tell an adult if they perceived danger in their community.

The message I brought to the elementary teachers and administrators was simple. If we want to save our children, we need to make changes far more powerful than installing metal detectors in schools and separating schools from neighborhoods with walls and gates. It's more about setting the stage for positive performance and being aware of what is really happening in our schools.

This article is not intended as a manual for change. It is simply a glimpse of how and why the principle of nurturing positive relationships is important to school change. The basis for the stories included in this section is real practice, using the International Center's model of change, which includes aspiring for rigor, relevance, and relationships, as well as examining and changing our practices based on what we know about what works in successful schools.

The 1950s Generation — Rigor, Relevance, then Relationships

In the 1950s, the *Leave It to Beaver*, *Father Knows Best*, and *Donna Reed* school of education dominated the local picture. Schools focused on rigor in the form of high-demand workloads for students. Every Friday was taken up by a 100-word spelling test and 50 math problems, and we were divided into “Bluebirds,” “Redbirds,” and “Sparrows.” We all tried hard not to be selected as “Sparrows” because these students worked slowly and were assisted by an aide all the time. No one asked about the relevance of the lesson. When the teacher gave us the assignment, no matter what it was, we all dutifully took out paper and pencil, placed our name, date, and class at the top of the sheet in the same fashion and completed each assignment. When assignments were not finished in class, parents were called and they made sure we sat down at the kitchen

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table to finish the work while supper was prepared. “Relationships” were those we formed in church, at Little League, or within our extended families.

The Post-Baby Boomer Generation — Relevance, then Relationships and Rigor

The next generation to come along was what we began to call the “I Deserve It” (IDI) generation. Its mantra was simple: Whatever I want, I need; whatever I need, I deserve; whatever I deserve, I have the right to have; and I will do *anything* to get it. The IDI generation came of age in the late 1970s to early 1980s. Their upbringing was largely the response of parents who decided, “I’m going to provide for my child all that my parents deprived me of as I was growing up.” Teachers and caregivers saw the changes and tried to adapt to the needs of these students. Rigor in lesson planning gave way to “relevance” to the student. “What’s in it for me?” was the question these youngsters asked when assignments were handed out.

Josephson, M. *The Power of Character*. Unlimited Publishing, 1994.

Teachers of the “Generation X” student learned quickly that motivating students would not be accomplished by the “hard rigor” of the preceding generation. Divorce and single-parent families became the rule, rather than the exception. Students in this category saw themselves as separate from their workaholic parents; work was something one had to do, even if only for a little while, in order to survive. Independence, resilience and adaptability are the guiding principles of the “Gen-Xers.” Motivation of “second generation” students by teachers became an amalgam of deferring to the value of the individual, providing challenging work and the freedom for the students to manage his/her own time and work, in addition to feedback and recognition. Many of the Gen-Xers are now teachers in our school system. Many of them try to avoid being labeled and view teaching as a “job,” rather than a career.

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Challenges Addressed and Solutions Created

The message was simple, yet profound. Together, we are greater than the sum of each of us individually.

One of my most memorable moments with teachers in this group came in 1994, when I was appointed to a school where the principal had basically been removed as a result of a petition signed by staff and given to the superintendent. At our first staff meeting, I asked them, “You just had the principal who was here with you reassigned. What can we do to ensure that it doesn’t happen again (to me)?” They all laughed, but one stood up in the back and said, “There are 600 thugs and hooligans in this school. You can make them behave, so we can teach them.” His voice sounded so stern that I knew he wasn’t kidding. All I could offer to them was, “I’ll take that challenge, but let me ask you a question: There is one of me and 600 of them. However, there are 600 of them and 60 of us. Which do you think will give us the better odds?”

The message was simple, yet profound. Together, we are greater than the sum of each of us individually. We issued 90 discipline referrals in the first 20 days of school during the first year (1994-1995). They were reduced to 26 referrals the first month of the following year, and to six referrals in 1996-1997. When *Better Homes and Gardens* magazine (April 1997) called to document our success, the reporter on the phone asked what I had done to make this happen. I replied, “What we have done has affected the school’s curriculum, its discipline policy, and the way staff members, students, and parents interact with each other. It has given all of them a common language.”

Shortly after, the teacher who had introduced the challenge of “making them behave” on my first day came into my office with a request. He wanted to know if I would write him a letter of recommendation; he wanted to go and teach in a rural mountain community. When I asked why he was leaving, he lowered his head and spoke softly. “They behave now,” he said, “but I still can’t get through to them. Maybe it’s time I tried somewhere else.” We

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shook hands and parted as colleagues. It wasn't a sad occasion because in two short years we had made a discernable difference in a community that prior to my appointment, had been known as a "gang school."

Still, I realized that the gangs in the school had not disappeared; they merely had discontinued their criminal behavior. The school administration, staff, and parents had provided every student with a safe environment, an identity as an individual, and a place where expectations applied to adults as well as children.

During those years between 1994 and 1997, we weren't trying to close and eliminate the achievement gap. We decided, as a community, that academic performance is part of the whole child. Our attempt did not include labeling and sorting children; it was only to instill in every child the notion that "smart is something you get," not something you carry in your DNA. Beauty, talent, and athletic ability may be genetic gifts, but intelligence and academic performance must be developed day-by-day, thought-by-thought, through courage, choice, and determination.

The Millennial Generation — Relationships and Relevance before Rigor

Today's students are a different group than those of the two preceding generations. We struggle in public schools to determine what works with students coming through the schoolhouse door in the beginning of the 21st century. Students of the millennial generation have often been called "digital natives." They (for the most part) have been raised in an environment replete with technology. Some of them have been subjected to "techno-babysitters" — video games, computer programs, and other electronic communications devices. Students of the millennial generation have developed relationships through Web pages such as MySpace and FaceBook. Motivation

Today's students
are a different group
than those of the two
preceding generations.

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for students today entails helping them to be connected to their learning environment. Many of our students cite family and teachers as their heroes. Their desire to be at school, a willingness to learn what is being provided by the current high school curriculum, and their enthusiasm for the learning process is largely dependent on their perceived relationship to the adults in their school.

Experiences and Advice

Each of the students we meet in our hallways and corridors today are as alike and as different as students from both of the previous generations. There is a mix of single-parent and nuclear families. Parents often come to the school for advice on what to do with this young adult who has suddenly appeared in their homes. It is tough to try to convince a parent that the modeling and conditioning that the student has seen in the past 12-15 years is now being demonstrated before their very eyes.

After seven years in central office positions, from director of secondary instruction to superintendent of schools, I requested an appointment as principal to one of our district's most challenging high schools. When I arrived at the school on Labor Day 2007, I stationed myself in the front entrance, just as I have done in every school in which I have been principal. Students coming into the building that morning did not respond to my hearty "good morning." They merely looked at me as if I was foreign to their world. I asked one of the assistant principals what they thought of students not greeting adults in the building and she said, "Oh, it's just how they are. We try not to bother them a lot." It was an astounding contrast from my last encounter with young adolescents in Maryland.

Wanting not to disrupt the school culture until I knew more about it, I walked into the area of the assistant principals' offices. About six

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or seven students waited for their chance to see an administrator, most holding a discipline referral in their hand. I asked a couple of the students to show me their referrals and accompany me to the principal's office. Reading the referrals on the way down the hall let me know that despite the 21st century having arrived seven years earlier, I was still in a high school. The referrals hadn't changed one bit.

As I spoke to the students about their infractions, they all seemed genuinely surprised that I was actually listening. Each of them spoke freely about the instruction in the classroom where the referral had been written, about their aspirations, and mostly about who they were as a person. I was a little taken aback by the candor with which they all spoke, telling me about issues in their personal lives that were getting in the way of being good students. It reinforced for me the notion that, as adults, we are charged with being worthy of the trust of our students.

As I spoke to the students about their infractions, they all seemed genuinely surprised that I was actually listening.

Tips and Suggestions for Implementing Change

Every adult — administrator, teacher, and parent — needs to examine what they are doing to advance student achievement and assess whether or not it is actually reaching its desired effect.

The ability to examine my own behavior in teaching, encouraging, advocating, and modeling (the TEAM practice) and to adapt *what* I do to *whom* I am addressing, *how* they have come to be with me, and *where* they have the potential to succeed has allowed me to see the necessity of change on a continual basis. The primary tips I offer to those interested in changing school culture are:

- Inquire without prying about students' backgrounds and discern their strengths.

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- When speaking with young adults, assess and access their prior knowledge and skills.
- Be aware of nonrecognition of the vernacular, especially in the use of humor.
- Be aware of each student's culture. It may be tied to areas of interest.
- Connect with current or known word usage and meaningful mental images.

Implementing change in school culture is not easy, but research shows that some steps are important in ensuring the success of a change venture. In those schools and districts where change has had the most promising success, the following steps have helped make the transition smoother. The time frame in which these steps occur will vary, depending on the receptiveness of the participants to recognize the need for change.

Implementing Change — 11 Steps to Tomorrow

- 1. Analyze the school/district — Why change?**
 - a. Are all subgroups of students performing well?
 - b. What is the organizational health of the school?
- 2. Reinforce a shared vision and common direction. Both should answer two questions:**
 - a. Is it worth it?
 - b. Can I do it?
- 3. Look for “critical mass.” Broad-based support (formal and informal) is important.**
 - a. Identify individuals and groups whose credibility is established.
 - b. Identify where each player is on the awareness/competence continuum.

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- 4. Provide information frequently.**
 - a. Start small and simple.
 - b. Focus on one or two issues.
 - c. Publicize successes.
- 5. Demonstrate respect for the past.**
 - a. Honor the work of your predecessors.
 - b. Emphasize the benefits of change.
- 6. Involve people and be honest.**
 - a. Communicate.
 - b. Provide meaningful opportunities for people to “own” the change.
- 7. Support others as leaders.**
 - a. Delegate critical tasks.
 - b. Motivate individuals to carry the message to “fence-sitters.”
 - c. Recognize those who model the intended changes.
- 8. Publish an implementation plan.**
 - a. Start with the end in mind.
 - b. Provide milestones for improvement.
 - c. Show others *how* they can succeed.
- 9. Balance the tension between “current condition” and “desired state.”**
 - a. Generate a sense of urgency.
 - b. Monitor progress frequently.
- 10. Facilitate learning structures, including:**
 - a. professional development
 - b. innovative recognition systems
 - c. emphasized rituals and traditions

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11. Reinforce and institutionalize change.

- a. Build internal capacity to embrace the change.
- b. Connect the change to school/district goals.
- c. Sustain the change through induction and refresher training.
- d. Hold yourself as well as staff accountable for the results of change efforts.

Conclusion: What Works in Real Life

The experiences described in this section focus on success in secondary schools through nurturing positive relationships. A review of the research, provided in the following table will give staff the opportunity to review, explore, and stimulate conversation as to how schools should address this principle. What occurs in your particular setting will differ only insofar as the demographics of your community. Our underlying premise is that guiding principles, specifically respect, responsibility, trustworthiness, loyalty, honesty, compassion, perseverance, courage, contemplation, initiative, optimism, and adaptability, are important regardless of a person's political leanings, race, religious convictions, or gender. Students and adults alike benefit from teachers and leaders who teach, encourage, advocate, and model these principles at all times. Every adult who works in an educational setting must always be aware that children are 25% of our population, but they are 100% of our future.

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Resources for Nurturing Positive Relationship

In the Classroom/School	School/District
Showing respect	Smaller learning communities
Active listening	Peer mediation
Encouragement	Avoiding “put-downs”
Displaying student work	Writing encouraging notes
Identifying unique talents	Celebrating accomplishments
Serving as role model	Using one-on-one communication
Teacher continuity	Creating an inviting classroom climate
Exhibiting enthusiasm	Using positive humor
Students praising peers	Character education
Taking interest	Team building
Mentoring	Rewards, recognition, incentives
Student advocacy	Advisement program
Students as teachers	Service learning
Frequent contact	Sports programs
Extra- and co-curricular activities	Alternative scheduling
Team teaching	Professional learning community
School-based enterprise	Family, community, business partnerships
Encouraging students to express opinions or ideas	Beginning of the year student social activities

Offer Multiple Pathways to Achievement

Greg Springston

Greg Springston is Assistant Superintendent for Secondary Education at Dodge City Public Schools in Dodge City, Kansas.

I have been a secondary educator for more than 35 years, 19 of those as principal in two large diverse high schools. After years of frustration over minimal gains in student achievement despite intensive schoolwide improvement efforts, I felt compelled to find the way to real, lasting school improvement. I came to the realization that efforts addressing issues such as student discipline, absenteeism, and apathy were doomed to fail because our efforts were merely addressing the symptoms of the problems. We needed to identify and address the root cause of the problems.

What Do You Want from High School?

As principal, I often talked with students about education and career goals. I found too many students had neither such goals in mind. Seldom did they see real connections between high school and future careers other than the perceived necessity of obtaining a high school diploma. If students had an educational goal, all too often that goal was simply to go to college. When asked why they wanted to go to college, they would answer “to get a good job.” If pressed to identify the “good job,” students most often cited the glamorous careers of medicine, law, or professional athletics. Seldom did students see the connection between their academic decisions and their career options.

Looking for insights into this academic-career disconnect, I asked students sent to my office for misbehavior or poor attendance to reflect upon the reason they were in trouble. Most responses revealed a belief that external factors were the reason for their problems. Students were not taking ownership — school appeared to be something done *to* them, not something done *for* them. I continued my conversations with them by asking what did they

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expect to get out of high school. Based on their shrugs, I knew their answer — they wanted “out” of high school.”

Student attendance patterns, course selection, senior release, and early graduation requests are all evidence that students just want to get out of high school. Most students weren’t taking advantage of advanced coursework, rigorous elective opportunities, or even school activities. If they had the opportunity to get out of school, they took it. It has become apparent to me that students do not believe our high school programs are preparing them for their futures. Most see high school as a rite of passage — a place to hang out until they are old enough to venture out into the “real world.” Somehow, once in college or on the job, life’s plan will materialize for them. Unfortunately, these students who are looking for real-life opportunities seldom plan for the future.

Relationships + Relevance = Rigor

Students, and all too often staff members, in high schools fail to see the relevance of class assignments, activities, or even courses. In the shadow of *No Child Left Behind* and Adequate Yearly Progress (AYP), high school is becoming even more impersonal and numbers-driven. AYP-driven school reforms have centered on whole-school or subgroup adjustments. Seldom do schools look at an individual student’s needs. The structure of the school makes it difficult, if not impossible, to address individuals within the system. The routines, processes, policies, and schedules dominate the high school experience.

Many of our secondary schools have become so large that students and staff get lost in the crowd. Teachers meet 125-150 students per day and often teach students for only one or two semesters. Students have seven or eight teachers each semester and seldom

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take classes from those teachers again. Relationships are not being developed; teachers don't have time to get to know their students well enough to know their interests, learning styles, or goals. Students are forced to adapt to teaching styles and teacher idiosyncrasies for multiple teachers each semester. In the absence of relationships, teachers are unable to make learning relevant for students and school administrators are unable to make teaching and school improvement assignments relevant to staff members. Without relevance, there is little motivation to perform to one's potential. Unmotivated individuals don't put forth the effort to achieve excellence. Rigor is not being attained.

Students must be taught how to apply knowledge and skills to solve real-world problems. The only way to accomplish this is to appeal to the interests, learning styles, and career goals of the student. Unfortunately, few schools are organized in a way to ensure this engagement of students. We must establish a system that allows students to explore for themselves the relevance of what they are learning — to make meaningful connections between the program of study and their future careers.

Career Clusters

I have found the work on career clusters (www.careerclusters.org) to be very helpful in developing a school structure to connect students with their futures. Career clusters link what students learn in school with the knowledge and skills they will need for success in postsecondary education and in careers. In fact, career clusters help students make informed higher-education decisions. Some career choices require baccalaureate degrees, some require industry-based certification, and some require specific knowledge/skill sets. Career clusters help students and counselors identify pathways from secondary school to postsecondary school to the workplace. This connection to future goals motivates students to

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make better education decisions, work harder, and enroll in more rigorous courses.

The state of Kansas has grouped the 16 career pathways, developed by the National Career Technical Education Foundation, into six career clusters (see following table) in the Kansas Career Pipeline (www.kansascareerpipeline.org). These clusters provide a way for schools to structure their academic programs and link core curriculum with electives. Some large schools have restructured into academies (three to six), each academy encompassing a cluster or pair of clusters. Student placement is determined by career pathway interests.

Career Cluster	Career Pathway
Health Science	Health Science
Human Resources and Services	Education and Training Government and Public Administration Human Services Hospitality & Tourism Law, Public Safety, and Security Transportation, Distribution, and Logistics
Business Marketing and Management	Business, Management, and Administration Finance Marketing, Sales, and Service
Environmental and Agricultural Systems	Agriculture, Food, and Natural Resources
Arts, Communication, and Information	Art, A/V Technology and Communication Information Technology
Industrial, Manufacturing and Engineering Systems	Architecture & Construction Manufacturing Science, Technology, Engineering, and Mathematics

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Career Guidance/Evaluation Schedule

To support a career-based program, a system must be developed that provides students and parents with the ability to make good career decisions. There are understandable concerns about asking teenagers to make career decisions; obviously, we wouldn't expect students to make permanent life decisions at age 15. However, students should be able to plan current educational programs based upon their career goals at that time. To support this process, a comprehensive career guidance and evaluation program must be enacted. This enables all students to appreciate and be motivated to enroll in more rigorous career-appropriate courses.

	Purpose	Focus	Target	Activities
Level 1	Understand work	Career exploration	Students with no established career focus	Job site visits, career fairs, guest speakers
Level 2	Understand career	Career planning	Students with some career focus	Job shadowing, specialized career fair/panel discussions
Level 3	Develop workplace skills	Career preparation	Students with general career focus	Cooperative work experiences (work-study programs)
Level 4	Develop career skills	Career skill development	Students with strong career focus	Specific work experience, internships
Level 5	Concurrent postsecondary or industry-based training	Career specialization	Students completing specialized program of study	Industry-based certification programs, 2 + 2 programs, apprenticeships

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Beginning no later than the 7th grade, career instruction should be incorporated into the academic program. Students should have the opportunity to participate in a series of integrated activities designed to help them understand their talents, interests, and aptitudes. Armed with this knowledge, students will be able to develop a career portfolio that they can continue to add to through 12th grade. Among other things, the portfolio should include a personal mission statement, an academic plan, and long-term goals. Each goal should include methods of achievement and challenges and strategies to overcome those challenges.

As students move through the grades toward graduation, mentors should support them in helping them to review and revise their portfolios. Portfolio review sessions should take place each semester.

Authentic Workplace Experiences

By the 11th grade, career portfolios should contain fully developed postsecondary or industry-based training plans of action. All students should develop a career plan that moves through the levels of the authentic workplace experience, including career exploration, planning, preparation, skill development, and specialization. Course enrollment should directly link to the student's current level of workplace experience.

Wall-to-Wall Career Academies

This journey of transforming Junction City High School into a wall-to-wall career academy high school began after confronting the brutal realities of unacceptable student attendance rates, discipline referrals, four-year graduation rates, and course enrollment patterns. It became clear that students merely wanted out of high school. This

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reality along with a clear picture of research-based success stories helped the school focus on what needed to be changed and how that needed to be done. Once determined, a map was designed, starting from the desired outcome and broken down into how the outcome was to be achieved.

This plan was clearly articulated and shared with all stakeholders. The school's informal leaders were identified and cultivated. Personal one-on-one contact was made with each staff member to identify and validate everyone's concerns. This process challenged the leadership team's vision and forced fine-tuning of the plan. The end product was greatly improved because of the input of the doubters. Though time-consuming, the investment made in consensus building was essential to the ultimate success of the school's transformation. All staff member concerns had been validated, all staff members had a voice in the process, and all staff members had ownership of the process. All staff members, certified and classified, were given the opportunity to vote – 85% voted in favor of making the transformation.

Armed with overwhelming support, the planning teams forged ahead. All staff members were assigned to a committee: Freshman Success Academy (FSA), Career Academies (later divided into Business and Information Technology; Science, Engineering and Technology; and Fine Arts and Human Services), Twilight School, and Facilities. A timeline was established.

School Year 2001-02

- Establish committees
- Determine academy themes
- Establish teacher selection process for academies
- Teacher placement in academies
- Academy locations determined

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- Twilight School staffing
- New course proposals (FSA)
- Finalize FSA staffing issues
- Reading, seminar, team leadership training

School Year 2002-03

- FSA implemented
- 10-12 academy-specific subcommittees formed to address academy structure, curriculum, partnerships, postsecondary connections, and leadership structure
- Instructional leadership training for the academies

School Year 2003-04

- 10-12 Career Academies implementation

The Vehicle — Not the Destination

It was made clear to the staff and stakeholders that the new wall-to-wall career academy structure was not the goal. The goal was to implement the school's mission statement: Junction City High School prepares students to become successful workers and citizens by developing relationships and incorporating relevance and rigor into their education.

By the 2005-06 school year, Junction City High School was a "wall-to-wall" career academy high school. All 1,500 students have the benefit of an articulated career awareness and preparation program.

Student performance data indicated that relationships + relevance did = rigor. The school's attendance consistently topped 90% and the graduation rate has risen for four consecutive years. The dropout rate remains at or below 3%.

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Academically, student test scores continued to rise as well. The percentage of students scoring at or above the state's mastery target for reading has improved for five consecutive years, from 42.5% in 2002 to 73.5% mastery in 2007 – a 73% growth. More important, every subgroup showed significant growth.

The impressive success of the Junction City High School transformation confirms that the traditional American structure for high school is obsolete – as obsolete as the old assembly line. Our schools must be transformed to meet students' needs in preparing them for success in the present and future world.

Prioritize the Curriculum — Less Is More

Teresa Dempsey

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Get your priorities straight! Ever heard that before? Think about the priorities in your own life. How does a “priority” in your own life get deemed a “priority” and not get lost in the other “stuff” that is going on in your world? Would you consider your personal priorities something special or essential for your life beyond today?

Now, apply this concept of a personal “priority” to teaching and learning. As educators, we would all agree that we need to prioritize what students learn. So, how do we determine a “priority” from stuff that is “nice to know”? What learning priorities are apparent in our classrooms and schools? Would you consider some learning more important or essential for a student's life beyond today? It's unlikely that one would hear an educator publicly declare that there should not be priorities in what one should learn.

What is sometimes fuzzy is a common agreement and articulation of what exactly should be deemed a learning priority, given the overload of content, as well as other stuff that is sometimes asked of us. International Center President Bill Daggett makes the passionate plea to educators: “If schools are to move forward to rigor and relevance, you must take something off the plate.”

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Learning priorities should not be created in a vacuum or held as isolated beliefs from teacher to teacher. To be fair to our students, guaranteed learning priorities must be represented and articulated in a curriculum. As education researcher Robert Marzano concluded from a meta-analysis of numerous studies, a “guaranteed and viable curriculum is the number one school-level factor impacting on student achievement.” Consider the advice of Grant Wiggins and Jay McTighe, co-authors of the book *Understanding by Design*, which is about their groundbreaking work in curriculum development.

Marzano R. J.
*What Works
in Schools –
Translating
Research Into
Actions. ASCD,
2003.*

We cannot stress enough the importance of long-term priorities in planning. Justifiable decisions about what to teach, what to leave out, what to emphasize, and what to minimize can be made only if there are agreed-upon priorities related to exit-level objectives. With no long-term goals, there is no perspective — hence no check on the teacher habit of merely teaching to short term, content-related objectives. Indeed, the greatest defect in teacher lesson plans and syllabi, when looked at en masse, is that the key intellectual priorities — deep understandings of transferable big ideas, and competence at core performance tasks — are falling through the cracks of lessons, units and courses devoted to developing thousands of discrete elements of knowledge and skill, unprioritized and unconnected.

Wiggins, G.
and McTighe, J.
*Understanding
by Design.
ASCD, 1998.*

Wiggins and McTighe advocate curriculum development prioritized on learning for deep understanding of big ideas and ability to transfer; this is the grounding principle of a learning priority.

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How Do You Determine a Learning Priority?

Wiggins, G.
and McTighe, J.
*Understanding
by Design.*
ASCD, 1998.

Easy, right? In my experience with curriculum development, I've found there's not a universal approach that works for everyone. Given each unique context, there are different routes one can take. It's possible that defining learning priorities could be a K-12 curriculum development team-writing project that takes a year or more once it is field-tested and peer-reviewed. Others may elect to work within grade-level or content-area teams and incrementally develop units using smaller chunks of time. This enables the opportunity to field-test and revise before developing a more systemic curriculum.

Regardless of the route, developing learning priorities is a process – a process that thoughtfully done will yield huge dividends for both students and teaching staff. It's not as simple as ticking off a grocery list of facts, skills, and definitions, pointing to a file cabinet of worn unit folders, or merely running off the textbook's table of contents (yes, I've seen this done!).

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State and local standards are important, but recognize that standards do not embody a curriculum. Also, not all standards are equal. Trying to cover each of the standards in instruction leads to the curriculum overload that many teachers feel. The Curriculum Matrix, published by the International Center, is a great place to begin to understand which standards are more important based on state testing and public feedback and research.

The next step in this process is “unpacking” state and/or local standards for big ideas that bring coherence to all the facts and skills being taught in the classroom. Discrete knowledge and skills become much more relevant when they are tied to a bigger picture and they are more conceptual in nature. Consider what is of more long-term value – memorizing a formula or really understanding why we have the formula and how it transfers to different types of scenarios.

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Another route is to begin with what you already have. Audit or re-examine present units of study through a lens that scrutinizes the learning priority currently present by asking:

- What really is the goal or point of this unit?
- Is the unit clearly designed to meet the intended goal, or is it hoped that students will be able to piece it together on their own?
- Is the unit content really a priority for what my students should be learning, or is it something I just love teaching?

For some, this is incredibly soul-searching and deeply personal. Answers to the preceding questions may coalesce into a disappointed realization that it's time to lay to rest a treasured unit used for many years. However, it could also yield a realization that this unit is close to meeting the learning goal, but it just needs some minor tuning for tightening up the focus. Taking things we're already doing and making them better is easier to handle than if we have to throw away everything we've always been doing and start from scratch.

Vertical grade-level or content-level conversations with teachers before and after progressing through class also can yield useful insights. Ask these teachers for a synopsis of key understandings they wish for their incoming or exiting students. These discussions help provide greater clarity as teachers discern what's most important as they examine massive lists of content goals.

Chapter 4 Principles of Change — Practitioner Perspectives

Learning Priorities as Understandings

Educational lingo can sometimes be mind-boggling. Often, education researchers have coined somewhat different terms for the same ideas. This holds true as we examine the idea of learning priorities. My preference is to use the language coined by Wiggins and McTighe.

A desired understanding is a priority. A student should focus on a small number of transferable big ideas about which understandings are stated – otherwise there really are no priorities.

After unpacking standards or reviewing/auditing presently used units of study, teachers should synthesize the big ideas into a statement called an “enduring understanding,” which simply means a statement that unifies more insight into “the why” behind the big ideas. It’s helpful to think of enduring understanding as “the big picture” for what we want our students to be able to visualize and articulate by the end of the unit. Mentally picture all the knowledge/facts/skills as the dots on a connect-the-dots puzzle that, once connected, create a unified and coherent picture – that’s the understanding.

Enduring understandings are learning priorities that we want our students to walk away remembering years after they may have forgotten (gasp!) some of the memorized names and facts. This is sometimes likened to the “moral of the story.” Think of the fable about the tortoise and the hare. Readers will not remember every minute detail of the story, but most will recall an important lesson that we can apply to aspects of real life.

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Another way of thinking about the importance of learning priorities focused on understanding is found in *Saturday Night Live's* Father Guido Sarducci monologue, "The Five Minute University." Father Sarducci suggests that he can teach in five minutes what most college students remember five years after graduation. Many laugh and share aloud personal examples of how they can relate from their own college experience. However, I'll never forget the day when a high school principal challenged his staff to reflect upon what their own students will say five years after leaving high school; the silence was deafening.

So, I ask all grade level teachers to reflect:

- What is so special about learning this content that will serve my students well into the future?
- If it's not clear to me, how can I expect it to be clear to my students?
- If it's not clear to my students, how can I expect them to care?

Courageous Conversations

Experience has taught me that some of the most dysfunctional teams are the quiet ones always nodding and agreeing with each other and never challenging ideas because they don't really communicate with each other. Ask your teaching departments/teams these tough questions:

- Do we share common learning priorities as a grade level or department? Should we?
- What's fair to the students in a classroom/course versus the students in the classroom next door taking the same course? Is it okay to be vastly different?

Chapter 4 Principles of Change — Practitioner Perspectives

- Is it plausible that a student in one classroom could have a completely different idea of the same concept from a peer in another classroom?

The responses may not be what we want to hear. But is that a reason not to discuss these critically important issues? The fact is these discussions can be eye opening, bringing about new and creative ideas. It's also interesting to learn what we each hold sacred in what we teach. Sometimes the ideas are similar but each utilizes different terminology. Other times they are vastly different. My assertion is that if we can't make sense of our ideas with each other, how can we expect our students to make sense of what they are learning.

Spending the time up-front on identifying learning priorities to use as a lens for what is being taught in the classroom results in a more efficient use of time in the classroom.

Who's Got Time for This?

Time is the precious resource that most of us never have enough of. It is indeed a precious commodity. Yes, this process takes time – to discuss, and perhaps even debate, with your colleagues. However, spending the time up-front on identifying learning priorities to use as a lens for what is being taught in the classroom results in a more efficient use of time in the classroom. Once an enduring understanding has been determined, it becomes the lens to use as a filter for determining which content really is the priority and then determining how it will be assessed and taught.

Less Is More – How?

“Less is more” is counterintuitive to how most might view teaching and learning. Some educators might believe that the more subject matter they are able to “cover” in class, the more students are

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learning. The question I pose is what do you value as “learning” – surface-level coverage or deep conceptual understanding? The latter equates to teaching less content with greater depth.

Prioritizing content and instructional strategies gives focus and clarity to what really is most important and has to be the foundational component of any teaching and learning initiative. Less is more when the goal is for teaching that serves a lifetime.

Chapter 5



Components of School Excellence

Overview

The International Center has created a framework to organize improvement efforts to enable school leaders to make sense of the complex array of change activators.

The previous chapters in this resource kit have described the change activators and principles. They encompass a broad theory that underpins change in schools and serves as a guide for school reform. Chapter 4 provides extensive practical advice from successful practitioners. The challenge, particularly for instructional staff, is to devise a framework to make sense of all these initiatives and suggestions, see how they connect, and collectively decide on what to stay with and the areas on which to focus the most efforts.

This framework is called the Components of School Excellence. These eight components, which have been derived from the International Center's work with the most successful and most rapidly improving schools, are described in a logical order but should not necessarily be followed in a rigid sequence. The path to excellence is winding and circuitous — think living-systems model.

This chapter will detail these components, as well as outline different school scenarios. Educators can use these situations to identify which Components of School Excellence should be focus on first. It is important not tackle them all at once. Doing so will prove unsuccessful and frustrate the education community.

The following are the Components of School Excellence.

1. Embrace a Common Vision and Goals – Rigor, Relevance, and Relationships for ALL Students
2. Inform Decisions Through Data Systems
3. Empower Leadership Teams to Take Action and Innovate
4. Clarify Student Learning Expectations
5. Adopt Effective Instructional Practices
6. Address Organizational Structure
7. Monitor Progress/Improve Support Systems
8. Refine the Process on an Ongoing Basis

Leading Change in High Schools

Embrace a Common Vision and Goals — Rigor, Relevance, and Relationships for ALL Students

Everyone must be committed to shared goals to measure success, and staff need to have the same perspective as to what is important in the organization. Schools must focus on the future in which the lives of 21st century learners will differ greatly from those of their parents and grandparents. Therefore, it is critical that today's students receive an education that is relevant to their future world and not one from the past. Highly effective educators understand that accepting the status quo will neither deliver the required skills necessary for success in a global economy nor adequately engage learners in a meaningful manner. Strong adult-student relationships and relevant instruction are keys that can unlock the doors to student engagement and the rigorous outcomes that will best prepare students for the demands of higher education and today's globally competitive workplace. The schools that recognize the interdependence of supportive relationships, relevant instruction, and academic rigor will be best equipped to deliver a meaningful, high-quality education to every student. The vision that defines effective schools is rigor, relevance and relationships.

This vision must be translated into school evaluation measures. The Learning Criteria to Support 21st Century Learners, with its balanced emphasis on Core Learning, Stretch Learning, Personal Skill Development, and Learner Engagement, is an ideal way to align the school accountability system with the vision of rigor, relevance, and relationships.

Schools, like any organization, must have a common vision shared by all.

For a detailed description of the Learning Criteria to Support 21st Century Learners, see Chapter 3.

Chapter 5 Components of School Excellence

Inform Decisions Through Data Systems

A well-developed data structure is based on multiple measures of student learning.

Whole school/district reform is a continuous process guided by a well-developed data structure. Highly successful schools/districts understand this, and they use quality data to make laser-like decisions about curriculum, instruction, and assessment. Using data structures, schools/districts accurately validate areas of strengths and needs, and effectively make adjustments to meet the needs of all students. These schools/districts are transparent with their data, and it is shared with all school stakeholders.

All too often, schools/districts are judged solely by the data produced from state testing in core academic areas and on whether they are meeting Adequate Yearly Progress under *No Child Left Behind* (NCLB). True data-driven achievement involves much more than merely reacting to test scores. There are many other fundamental pieces of data that schools and teachers must acquire and analyze in the process of improving student performance. The determination of what and how much to teach must be based on data that shows what the world beyond school expects high school graduates to know and be able to do. This includes the requirements of higher education, the workplace, and in society.

The research and resources of the International Center, including the National Essential Skills Study and the Curriculum Matrix data, as well as Lexile research by MetaMetrics on literacy requirements, are all sources of information available to schools and districts that will allow them to guide instructional decisions and assess student performance.

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Empower Leaders to Take Action and Innovate

Schools that will be most successful in the 21st century are led by leaders who possess skills and attitudes to take action rather than defend the status quo. The charge of school administrators is to build awareness and support for change in institutions that are steeped in tradition and inherently resistant to change. Leaders must work with the staff and community at large to develop a consensus on what to change and how change will be made. Meaningful, sustained reform more likely will take place when teachers, parents, and community work toward a shared vision. Leadership does not reside in a single position, but encompasses the diversified skills of many. It is this distributed leadership that defines successful schools.

Clarify Student Learning Expectations

While states have articulated learning standards for K-12 students, these standards tend to be broad and open to interpretation. Many schools have yielded to state standards and distributed study guides to prepare students for assessments. This is not a curriculum, and effective schools realize this. State tests are, by nature, more prescriptive in defining learning, but even tests leave out essential skills that are hard to assess but important for students to learn. Moreover, conflicting state standards, tests, and community expectations manifest in schools a wide-ranging and jumbled assortment of curricula, instructional practices, and classroom materials, as well as varying expectations for rigor within and across grade levels. Connections between concepts across courses may not be made from year to year, and instruction too often is not planned to explicitly build upon previous learning and toward future learning. Schools that are raising student achievement have developed a scope and sequence curriculum between grades and across disciplines, along with rigorous and relevant student work and learning experiences.

Chapter 5 Components of School Excellence

Adopt Effective Instructional Practices

More than high test scores, successful instructional practice includes having a wide range of strategies and tools to meet the needs of diverse learners in all disciplines and grade levels. In the nation's most successful schools, grading systems are adapted to measure proficiency and brain-based research informs daily practice.

To achieve higher levels of student engagement within the curriculum, there must be a shift from teaching to learning. Success in achieving state standards results not from teaching in routine and proscriptive methods, but from teachers selecting successful practices and personalizing instruction to meet the needs of all students.

Address Organizational Structures

There are a number of organizational structures that can help provide a more personalized learning experience for all students. They include:

- small learning communities
- academies
- career and technical education programs
- community/business partnerships that provide work-based experiences and internships
- prevention and early intervention initiatives, such as transition programs for incoming freshmen

These strategies make it easier for schools to forge staff collaboration and to sustain learning environments designed to provide students

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with rigorous coursework, relevant experiences, and meaningful relationships with teachers who will help them attain their goals and aspirations.

It is important to note that instructional needs should determine the organizational structure. Only after a comprehensive review of instructional practices should schools begin to address the issues of organization, such as school schedules, use of time, unique learning opportunities, school calendars, and physical structure. Many schools mistakenly adopt new organizational strategies, such as small learning communities, without a clear idea of what will be different instructionally as a result of the change.

Monitor Progress/Improve Support Systems

Educators who have implemented highly successful programs recognize the need to monitor student progress on a regular basis. Successful schools use formative assessments in an organized, deliberate, and ongoing fashion to monitor student progress. Furthermore, they use this data to immediately adjust instructional practices and intervene to better meet student needs. Additionally, successful schools use tools such as the Learning Criteria to Support 21st Century Learners to assess their current status and monitor ongoing progress.

Students with disabilities may need different support mechanisms in place, and staff from both general education and special education should collaborate to provide learning environments that challenge students to reach standards and provide the necessary support for them to persist and be successful.

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Paying particular attention to the needs of students with disabilities and students who are English language learners is an important part of monitoring progress.

Component Outcomes

Refine the Process on an Ongoing Basis

Success is an ongoing and ever-changing process. Student needs, community demographics, state requirements, and college and work-ready skills are continually changing. Successful schools utilize a planning process to continually monitor and reflect on student learning and performance. This important step should reinvigorate the process and cause school leaders to look at new and emerging challenges, and explore potential solutions and successful practices from around the country.

Following is a rubric that can be used to evaluate school/district performance based on the Components of School Excellence.

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Components of School Excellence	Intended and Observable Outcomes
Embrace a Common Vision and Goals — Rigor, Relevance, and Relationships for ALL Students.	• Leadership, staff, students, and stakeholders can articulate the reasons for change and can describe the school improvement vision. • Leadership and staff exhibit a culture of high expectations that embraces rigor, relevance, and relationships for ALL. • Staff and stakeholders take ownership of an improvement plan with clear goals and objectives. • Leadership is focused on sustaining momentum for change and on reducing resistance to change.
Inform Decisions Through Data Systems.	• Education values and the shared vision of leadership and staff are translated into measurable learning goals and criteria. • Data-driven decisions are used as the basis of strategic planning; day-to-day activities are connected with overarching goals. • Current data is available and used to make decisions, set goals, and measure progress. • School success is based on multiple measures of student achievement using the Learning Criteria to Support 21st Century Learners • The school uses the Learning Criteria as a roadmap to guide and assess its reform process.
Empower Leadership Teams to Take Action and Innovate.	• The effectiveness of school and district leadership is apparent to all. • Leadership is distributed among staff who are knowledgeable of change management principles and processes. • Current leaders are retained and energized; new prospective leadership talent is identified and developed. • Capacity and momentum maintain the vision of continuous improvement and sustain a culture of rigor, relevance, and relationships.
Clarify Student Learning Expectations.	• Clearly articulated, scaffolded, and prioritized curricula by subject are aligned to state, local, and industry standards. • Learning expectations and student proficiency levels are clearly defined.

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Adopt Effective Instructional Practices.	• Teachers are conversant with the Rigor/Relevance Framework and design instruction accordingly. • Differentiated and personalized instruction built on positive relationships is evident in all classrooms. • Instructional needs of special education students, English language learners, and disengaged students are accommodated. • All teachers address literacy and mathematical proficiency, as well as personalized learning.
Address Organizational Structures.	• The school is results driven and focused first on effective instruction. • Programs, structures, and the physical environment reflect a concern for and reinforce relationships, address student needs, and offer a safe, secure, nurturing, and engaging environment for learning. • Instructional goals determine organizational issues and structures; organizational issues and structures are adapted to support the learning needs of all students, forge staff collaboration, and provide a personalized environment that supports relationships and encourages achievement. • Time, use of space, and resources are aligned with student learning and engagement goals.
Monitor Student Progress/Improve Support Systems.	• Data based on achievement, learning, engagement, and progress data is monitored and analyzed regularly for all students. • Students with special needs are identified and provided with services to drive success in learning and achievement. • Multiple pathways to achievement are offered. • Academic intervention strategies are available, understood by staff, students, and stakeholders, and fully and effectively utilized.
Refine the Process on an Ongoing Basis.	• Goals based on the Learning Criteria to Support 21st Century Learners are frequently monitored and measured against the school improvement plan. • There is continuous review and refinement of the school improvement process, as well as the monitoring of national trends, local needs, successful models, and best practices.

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The following are a number of education initiatives, which are categorized under each component, that schools often are involved in. This will be helpful in showing staff how all of these various activities connect.

Actions to Take

Embrace a Common Vision and Goals — Rigor, Relevance, and Relationships for ALL Students

- Engage the community in setting high expectations for all students.
- Use the Rigor/Relevance Framework to establish a definition of rigor and relevance.
- Reflect on the curriculum and student achievement in terms of rigor and relevance.
- Affirm and practice the belief that all students can learn.
- Focus on personalized and positive relationships between adults and students that support high levels of achievement.
- Communicate the school's vision at every opportunity.
- Model the vision in all professional work.

Inform Decisions Through Data Systems

- Integrate the Learning Criteria into the school improvement process.
- Use data to drive goals and action plans.
- Use data to identify curriculum priorities.
- Use data to measure student progress continuously.
- Use timely data to prescribe instruction intervention.
- Use data to determine instruction that is personalized.
- Use data to evaluate effectiveness of innovations.

Chapter 5 Components of School Excellence

Empower Leadership Teams to Take Action and Innovate

- Organize grade level and other teacher/leader teams around groups of students rather than traditional subject areas.
- Provide team-building experiences.
- Establish professional development program to train administrators and teacher leaders.
- Distribute Leadership among all stakeholders.
- Establish programs that integrate the change process into school systems.

Clarify Student Learning Expectations

- Establish programs that utilize the Curriculum Matrix and National Essential Skills Study (NESS).
- Prioritize of the curriculum – alignment, scaffolding, and setting student proficiency levels.
- Use Lexiles to improve literacy.
- Align standards to real-world relevancy.
- Ensure that curriculum mapping takes place.
- Use common assessments across the schools for writing and other student work.

Adopt Effective Instructional Practices

- Use the Rigor/Relevance Framework.
- Focus on Quadrant D of the Rigor/Relevance Framework to develop rigorous and relevant instruction.
- Use and integrate instructional technology.
- Focus on reading and writing literacy.
- Focus on math literacy.

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- Establish instructional practices to meet the needs of struggling learners, including those in the following groups: special needs, ELL, and at-risk students.
- Provide interdisciplinary instruction.
- Make problem-based learning part of the curriculum.
- Engage students and build positive relationships between adults and students.
- Develop articulated, focused, and well-defined professional development programs.
- Establish master teacher programs, teacher coaching, and modeling of effective instruction.
- Ensure that there are effective teacher mentoring practices.
- Brain research is incorporated into the teaching process.
- Learning styles research is used to improve instruction.
- Ensure a rigorous and purposeful senior year.

Address Organizational Structures

- Implement transition programs.
- Implement small learning communities.
- Implement career academies.
- Implement freshman academies.
- Look at innovative scheduling and flex time.
- Extend the school day.
- Use block scheduling.
- Encourage dual enrollment for college credit.
- Work with community business leaders to secure internships.
- Build parent, community, and business partnerships.

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Monitor Progress/Improve Support Systems

- Establish a pyramid of intervention strategies.
- Implement AVID (Advancement Via Individual Determination) or other student self-development programs.
- Establish advisory groups.
- Assess 21st century skills (using Learning Criteria to measure personal skills, for example).
- Use alternative assessments.
- Develop 9th grade transition activities.
- Establish a schoolwide emphasis on literacy to address needs of English language learners.
- Provide assistance with postsecondary education transition.
- Develop instructional practices that incorporate inclusion and co-teaching for students with disabilities.
- Develop transition activities for students with disabilities.

Refine Process on an Ongoing Basis

- Network with other schools and professionals.
- Reflect and change as needed.
- Keep the “plate” organized and reiterate the common focus.

Each of the Components of School Excellence can be condensed into two words:

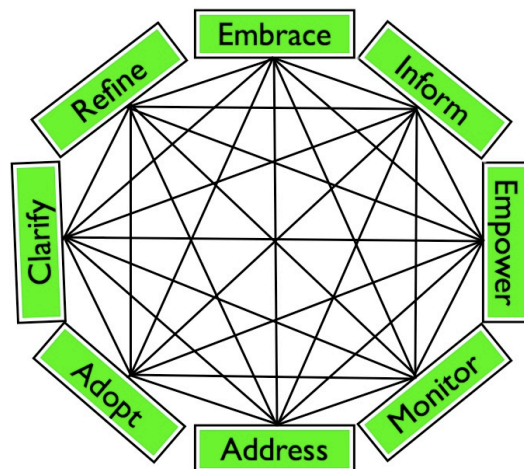
1. Embrace vision
2. Analyze data
3. Empower leaders
4. Define learning
5. Adopt practices

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6. Address structures
7. Monitor progress
8. Refine process

This important list can be further referenced by simply using the first word from each Component that describes the action schools need to take. The eight verbs form the following diagram. Schools as Living Systems Framework shows that the Components of School Excellence are not linear steps but connect to each other, so all of them ultimately need to be addressed. Where to begin depends on the unique needs of each school.

HOW to Change: Schools as Living Systems Framework



Combining the Components of School Excellence with the Living Systems Framework

The Living Systems Framework, introduced in Chapter 3, gives school leaders a mental model for understanding the unique characteristics of schools as systems. Schools are definitely systems with their interconnected set of processes that encompass inputs and outputs. Many of us are familiar with industrial systems models, such as manufacturing or computer information systems. These are closed systems, isolated from outside influences. They have tight control over inputs, and once the process is designed, they tend to run consistently until they wear out or break down. In contrast, “living systems,” as seen in plants and animals, are open systems that are significantly influenced by the environment. They have automatic mechanisms to adapt to their surroundings, have less control over inputs (food supply), and have ability to grow and mature over time. They also seek to maintain balance and resist change, which biologists call homeostasis. In living systems, there are defined cycles of rapid growth and slow growth. Schools have these same characteristics of a living system.

When considering the process of school improvement following the Components of School Excellence, it is important to consider this mental model of schools as living systems. Without this broader perspective of recognizing the unique characteristics of schools, any improvement efforts likely are to be ineffective. The list of components alone will not drive meaningful improvement.

In the following tables, the two columns for each component show an industrial systems mental model versus a living systems mental model.

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1. Embrace Common a Vision and Goals — Rigor, Relevance, and Relationships for ALL Students	
<i>Industrial Systems</i>	<i>Living Systems</i>
• Describe in terms of school	• Describe in terms of students
• Instill fear	• Inspire passion
• Set goals for your best students	• Set goals for all students
• Place priority on short-term results	• Place priority on long-term improvement

Vision is important in any change. Schools should embrace a common vision, not described in terms of the institution, but in terms of whom the institution serves – the students. An appropriate vision should inspire passion rather than instill fear. Another pitfall of the industrial model is in its vision of exalted expectations in that only some students can realistically achieve and many students will not “measure up.” A living systems vision embraces the notion that all students can achieve. This vision also should build toward long-term improvement and not myopically focus on short-term goals.

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2. Inform Decisions Through Data Systems	
<i>Industrial Systems</i>	<i>Living Systems</i>
• Use single measure of success	• Use multiple measures of success
• Focus on deficiencies	• Focus on proficiencies
• Reduce variation	• Value innovation
• Measure frequently	• Measure but don't disrupt growth
• Use fixed measures	• Use growth measures

In industrial systems, it is easier to focus on single measures of success, such as the cost to manufacture a product or the speed in which a transaction is completed. Schools are more complex, requiring multiple measures of success. Single tests do not reveal a well-educated student. While industrial systems tend to focus on deficiencies and what doesn't meet standard, schools are more successful in focusing on what does work and student proficiency rather than deficiency. Schools also should use measures that do not simply determine whether a student meets the standards, but allow student measures that show growth.

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3. Empower Leadership Teams to Take Action and Innovate	
<i>Industrial Systems</i>	<i>Living Systems</i>
• Avoid mistakes	• Innovate
• Deliver results now	• Think long-term
• Cut costs	• Increase morale
• Improve new hires	• Improve teamwork
• Respect the rules	• Be flexible
• Compete	• Collaborate
• Retain control	• Decentralize

The goal of school leaders is to encourage teams to innovate and improve teamwork rather than fall into a compliance mode of following routine procedures. The constant change and influence that impact school systems require teams of teacher leaders to make professional judgments, consider innovations, and explore new ways to meet school goals. This is best done through collaboration rather than competition.

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4. Clarify Student Learning Expectations	
<i>Industrial Systems</i>	<i>Living Systems</i>
• Define learning from specific skills up to full student	• Define learning from “whole” student down to specific skills
• Cover everything that might be important to learn	• Help students learn priority skills deeply
• Break apart curriculum	• Integrate curriculum

One of the key distinctions between industrial and living systems is the concept of parts to a whole. In the industrial system model, the “whole” process or product can be subdivided into its many parts and then reassembled into the whole. Living systems are more complicated. Merely focusing on the parts does not necessarily reassemble into a successful whole. For example, a school curriculum that is divided into language, math, and science instruction does not equal a whole education. Educators must also deal with emotional issues or learning disabilities in order for many students to achieve. When it comes to dealing with the “whole product,” educators must pay attention to the whole student, not just the discrete parts of a curriculum.

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5. Adopt Effective Instructional Practices	
<i>Industrial Systems</i>	<i>Living Systems</i>
• Teach skills in isolation	• Teach skills in context of life
• Isolate instruction from parents and community	• Connect instruction to parents and community
• Standardize procedures	• Share best practices
• Give separate assessments	• Give embedded assessments
• Strive for consistency	• Strive for innovation

Improvements in instructional practice, when using an industrial systems model, focuses on fidelity and consistency. Experts carefully refine and define the best methods and expect all teachers to follow the researched and tested approaches. Also, efforts are made to teach skills in isolation to maximize learning. The problem is that all teachers and students are different. They have different resources, and students bring different prior experiences to the class. Schools as living system are constantly influenced by the outside world and so must constantly change their strategies.

6. Address Organizational Structures	
<i>Industrial Systems</i>	<i>Living Systems</i>
• Consider people as interchangeable objects	• Consider people as unique resources
• Build hierarchies	• Build networks
• Don't waste time building relationships	• Spend time building relationships
• Ignore social aspects	• Pay attention to social aspects

The industrial model tolerates people. These systems tend to minimize human influence and treat people as interchangeable parts of a process. Organizational changes in industrial systems tend to assume that people can be moved anywhere and they will perform as instructed. Anyone who has tried this knows how unsuccessful it is. People are social beings, and any organization that ignores relationships and social networks is doomed to failure. Successful schools recognize that people in an organization have unique talents and are not interchangeable cogs in a wheel. Schools as living systems work proactively to build relationships and take relationships into consideration when making organizational changes to achieve the goal. In living systems the organization follows the function of what is to be accomplished.

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7. Monitor Progress/Improve Support Systems	
<i>Industrial Systems</i>	<i>Living Systems</i>
• Cast aside students outside quality expectations	• Value every student even if he/she doesn't meet expectations
• Follow "sink or swim" attitude	• Provide additional supports
• Use "pull-out" interventions	• Use "push-in" interventions

All systems need to be monitored and adjustments have to be made. No system works as smoothly as it was designed. In many industrial systems, products that do not meet quality standards are cast aside. Schools, working with live students, do not have that option. Schools cannot cast aside students who struggle to meet expectations. The sink-or-swim attitude does not work well in schools. Students often need additional supports to succeed, and each student should be valued.

8. Refine the Process on an Ongoing Basis	
<i>Industrial Systems</i>	<i>Living Systems</i>
• Introduce changes as soon as possible	• Introduce changes at the beginning of a natural cycle
• Isolate processes and problems	• Consider connections among processes
• Isolate from external influences	• Anticipate external influences

The final component is to refine the process on an ongoing basis, which is part of continual improvement. Industrial systems tend to introduce improvements as soon as they are identified. Industrial systems also try to isolate problems and fix them individually. In schools, as living systems, there are natural cycles: school year, school day, and student growth and maturation. Not every “fix” can or should go into place immediately. The complex connection among processes and activities often means that changes to one aspect of school will likely create unintended consequences somewhere else. School changes cannot be made in isolation, and leaders should anticipate this ripple effect consequence.

Leading Change in High Schools

High School Types

School leaders often ask, “Where do I begin?” The answer to this question depends on the current characteristics of the high school. Here are six different types of high school situations.

Fresh Start describes high schools that are new comprehensive schools, a new charter high school, or a recent conversion to small learning communities.

Movie Set describes high schools that have an excellent image and tradition. They meet all state accountability measures. However their public image is better than their true performance. They look good superficially but behind the public façade these high schools are not serving many students well.

Good to Great are high schools that have many good achievements and now want to move to the next level.

Slippery Slope describes high schools that have a history of good performance but their environments and/or communities are changing rapidly. They may be experience demographic shifts or changes in funding. Without some turnaround, they are on the downward slide toward poor performance. These schools are often unprepared to adapt to continuous change.

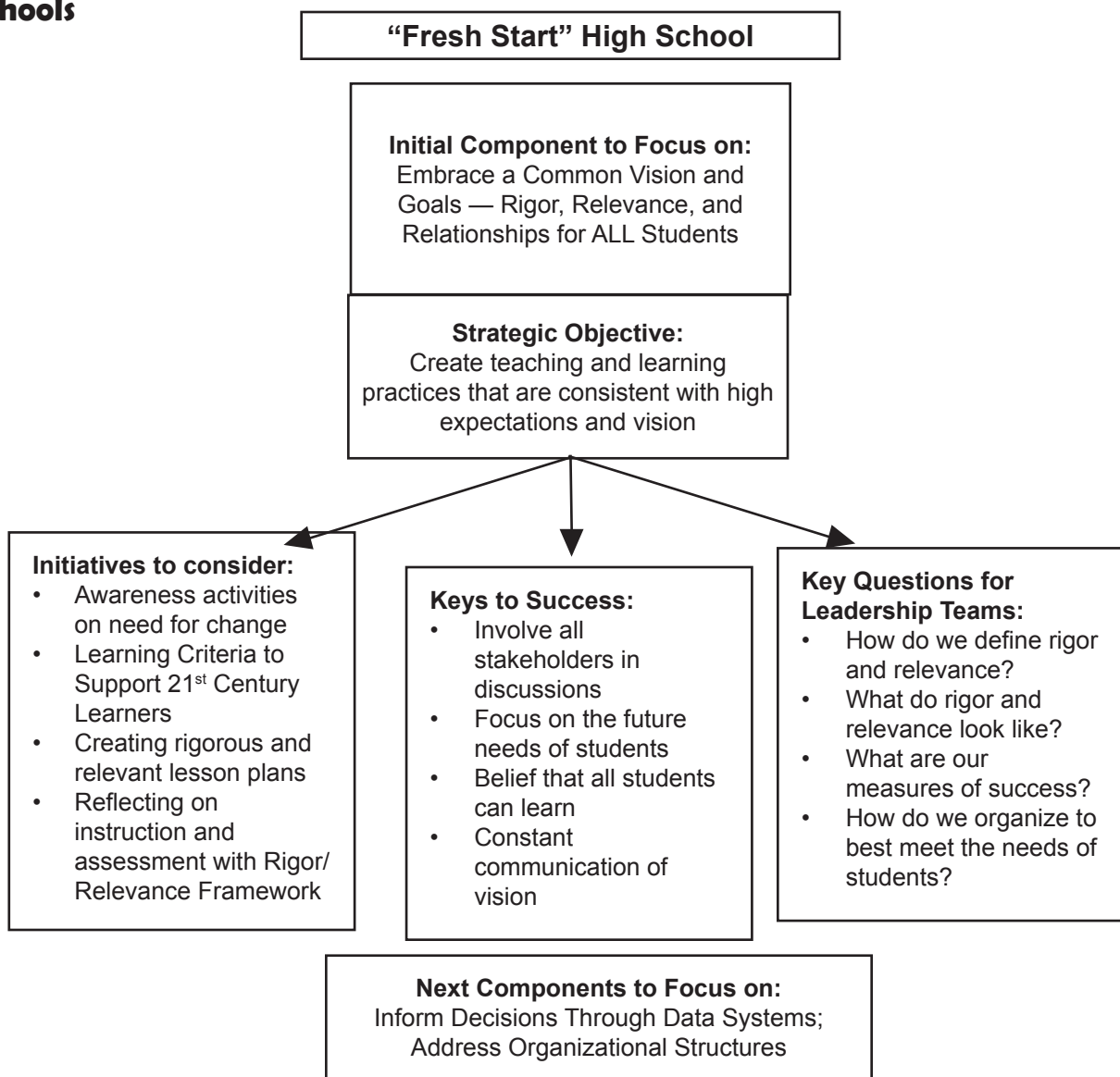
Excellent Education Except describes high schools that have “excellent education, except” — except they don’t meet AYP in one or more subgroups. These schools are good by traditional measures, but the AYP standards and subgroup performance has identified weaknesses.

Not for My Children describes schools for which there is unanimous agreement that they have significant problems, such as student underperformance, high attrition rates, poor attendance, low graduation rates, and often poor student behavior.

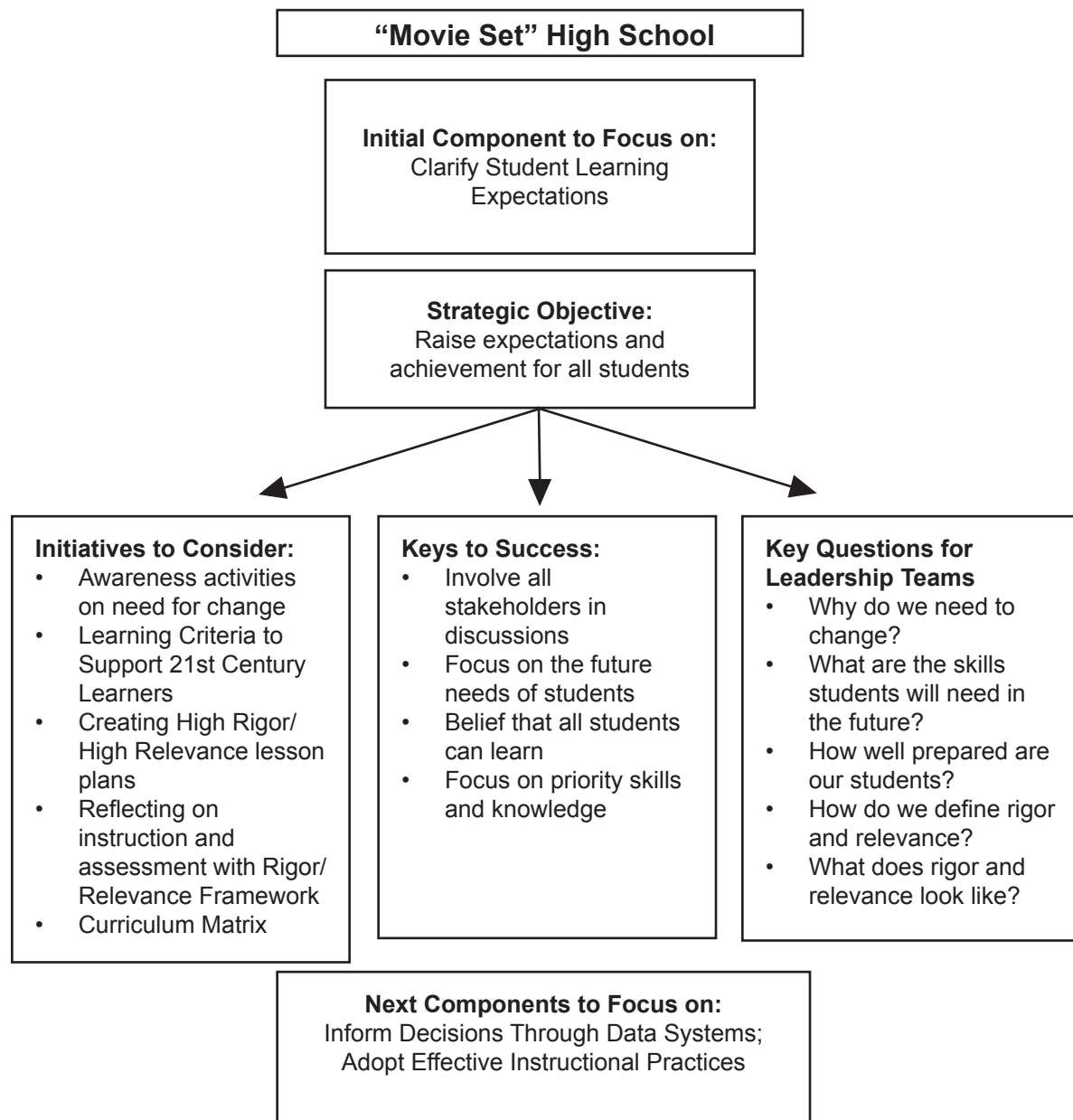
Chapter 5 Components of School Excellence

Sequence of Improvement for Different Types of High Schools

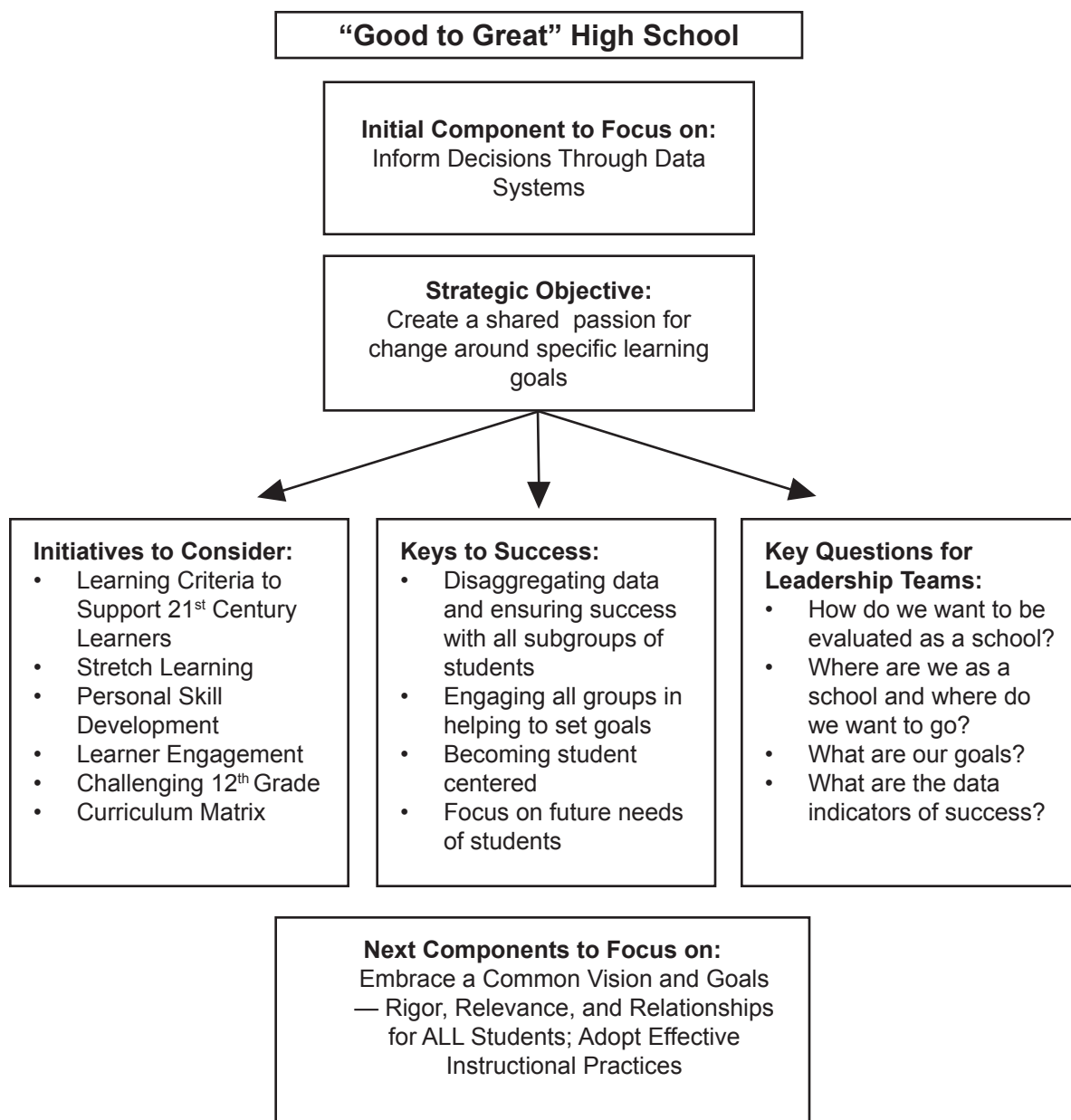
Each of the following charts indicates how to use the Components of School Excellence depending on the type of school. The charts indicate the three highest priority starting points. Additional components can be addressed in later steps.



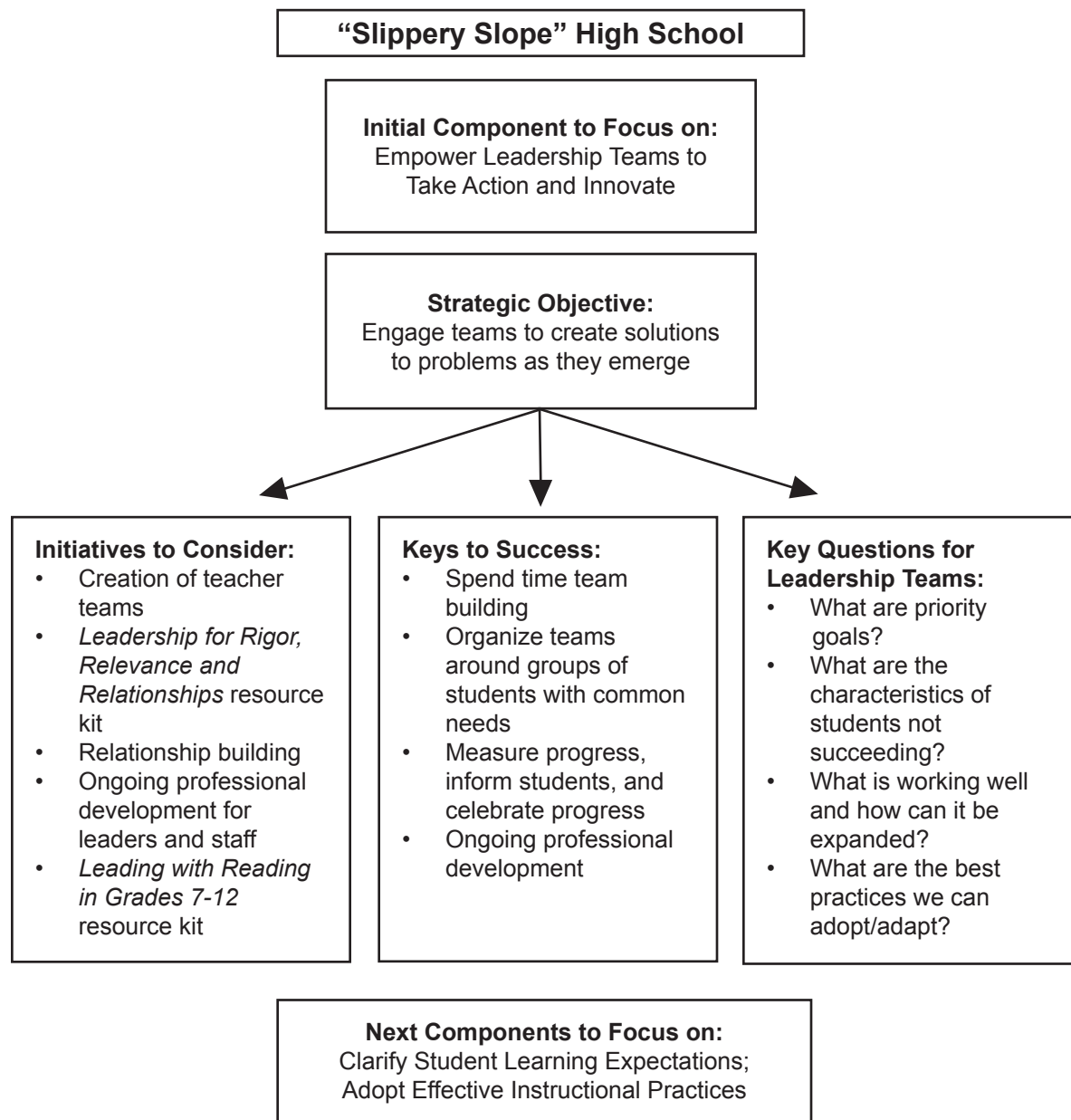
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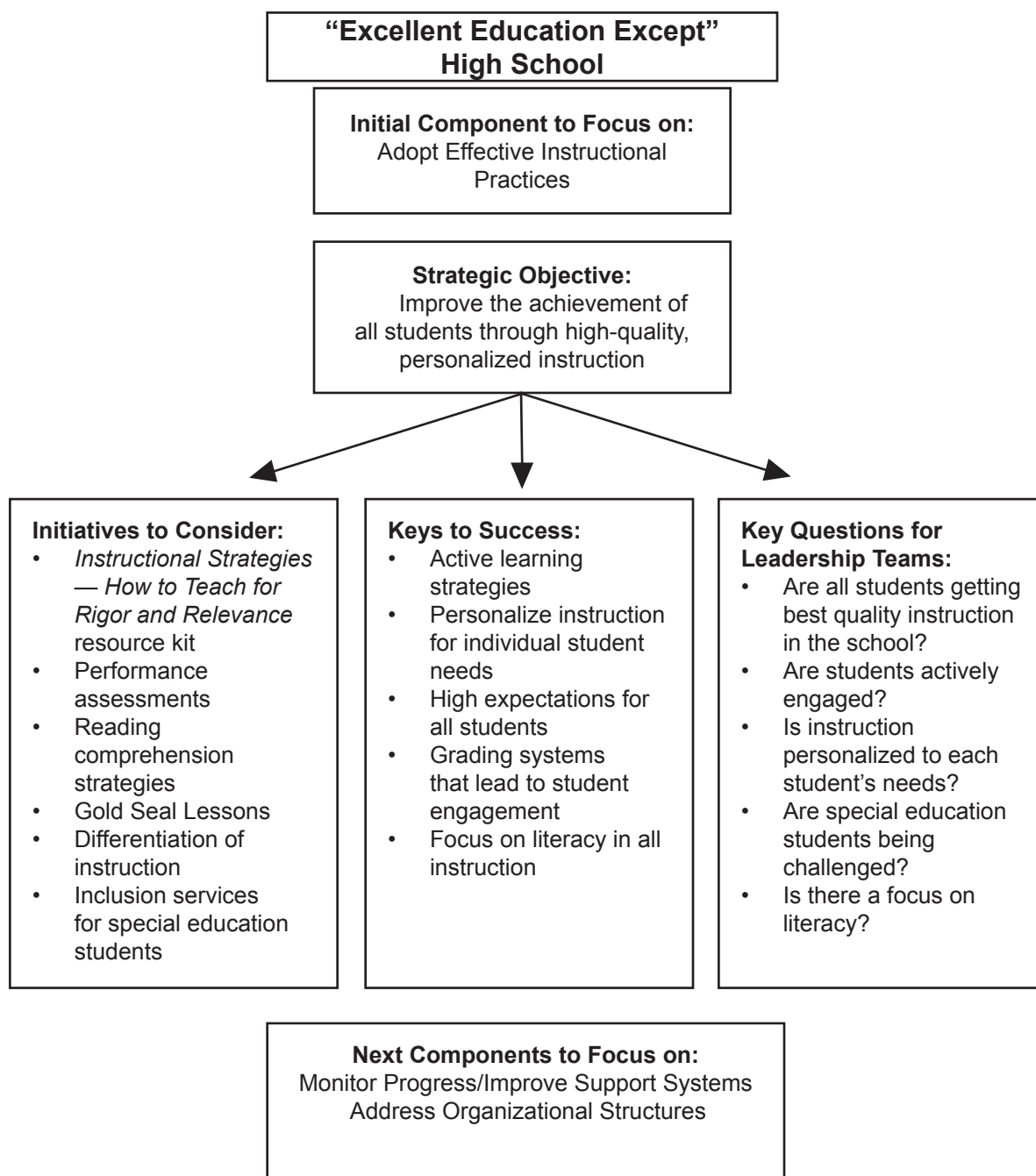
Chapter 5 Components of School Excellence



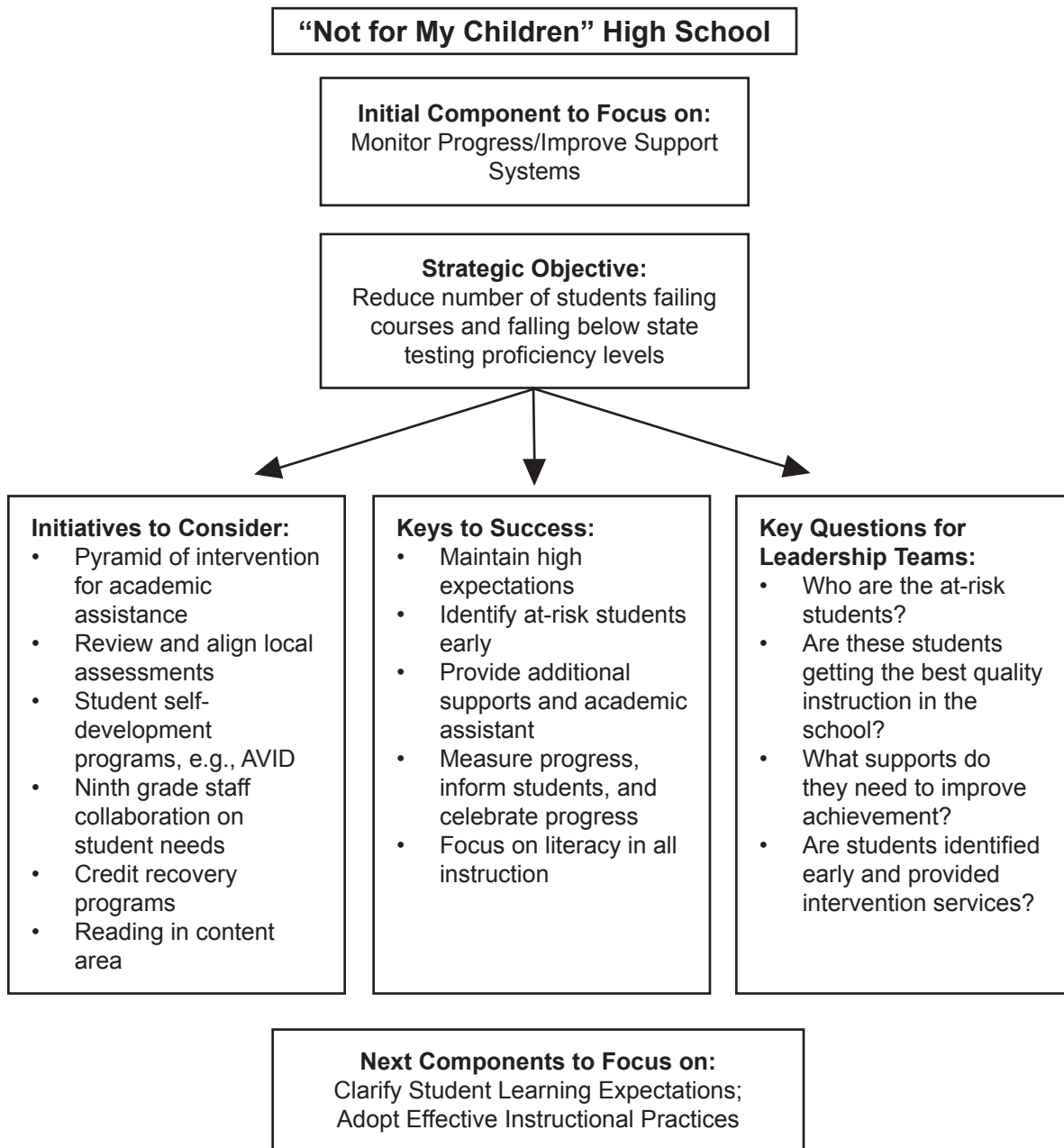
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Chapter 5 Components of School Excellence



Leading Change in High Schools





Chapter 6

Tools and Techniques for Professional Development

Overview

The following activities, checklists, and other resource tools are grouped into three categories of change: Context, Process, and Content.

- **Context** for change includes activities and checklists to enable teams to reflect on the issues and challenges affecting high schools today.
- **Process** of change includes activities to lead and facilitate the organization and development of leadership teams in schools, as well as activities that can be used to conduct meetings, analyze issues, and review current practices to create solutions.
- **Content** for change includes tools and checklists for leaders, teams, and staff to learn about most effective high school practices directly tied to rigor, relevance, and relationships.

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Context



Organization Timeline

Purpose

Reflecting often on the significant events and achievements of an organization allows current problems to be seen in light of the organization's historical strengths and mission. Each school is different. It is important to understand the history of the school as a basis for addressing current needs.

Preparation

Use a chalkboard or several connected sheets of newsprint to create a timeline for the history of this particular school.

Procedure

Time
20-30 minutes

1. Divide the participants into small groups of 6-8 people.
2. Charge each group to identify 5-10 significant events (positive or negative) in the history of the school organization. Identify the event and the approximate year it took place. Give each group 10 minutes to complete this task, and ask one group member to be prepared to report the results.
3. Convene the large group and record a timeline of significant events identified in the various small groups. Begin by asking for the earliest recorded year among the events listed by each of the small groups and continue in chronological order until all of the events have been listed on the newsprint or chalkboard.
4. Once the entire timeline is assembled, discuss for a few moments with the entire group the most significant events that have occurred. As the facilitator, make any connections between the events in the organization timeline and current issues confronting the organization.



Interviewing Stakeholders

Purpose

Interviewing stakeholders is an excellent way to help a team reflect on current practices and to develop creative solutions. This process supports social learning and gives adults access to new ideas or an opportunity to hear the viewpoints of others.

This procedure works best when a team is “stuck” and needs a creative boost to solve a problem or has a long to-do list. It also can be used to reorient the group to the purpose of the work at hand or to celebrate success.

Preparation

Depending on the size of the venue, microphones may be necessary, one for interviewee and one to pass around to team members. For small groups, only seating furnishings are needed.

Procedure

1. Create a list of questions that will be relevant for the interview. Choose a facilitator. Identify the individuals you want to invite to the interview.
2. Invite one to three stakeholders to the interview: those who will benefit from, receive, or need to contribute to the work.
3. Orient the interviewee(s) to the work being done ahead of the interview. Also give them a few starting points or questions to answer.
4. Have the facilitator start the interview with a prompt from the questions or points given to the interviewee ahead of time and allow time for the interviewee(s) to respond. (5 to 10 minutes)
5. Invite the rest of the team members to ask the interviewee follow-up questions (10 to 15 minutes).

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6. After the interviewee leaves, process what you have learned. Use any conversation starter that allows individual reflection first and then group processing. Decide how what you learned will influence the next steps of your work.

Examples and Uses of Interviews

- A team manages to boost math scores. Invite three students who were successful to be interviewed. The students may be at various performance levels; however, all should have shown growth. Ask students what strategies had the greatest payoff and what they are the most proud of with their math gains. The interview is a great way to celebrate and move the team to next steps in the work.
- A high school team is restructuring the 9th grade year. Several students are interviewed — some who dropped out, some who went through tough times but stayed in school, and some who met with success. This interview will help the team know where to start and how to prioritize steps that help students succeed when they reach a fork in the road.
- An elementary team is trying to increase parent involvement. Several parents are brought in or home visits are conducted using the same questions. This will help the team choose the best solutions that make parents feel welcome and involved.
- A school district is working to structure new-teacher support for maximum success. New teachers are interviewed by the principal and/or superintendent at the end of the year to determine what effective support they received and what was lacking. This will help differentiate the support by need or experience. This also may help a team plan for second- and third-year follow-up support.

Sample Interview Questions

Students

1. What were your biggest successes, and what were your challenges?
2. What could we do differently to help you be more successful?
3. When you reached the point in which you had to change your behaviors and experiences, what happened at school or home that helped you the most?
4. What are your favorite strategies that work for you in _____ (list content area or skill)?
5. What do you want us to know as we plan for _____ (list initiative)?
6. What could we do differently to support our students?
7. What really helped you learn _____ (English, math, etc.)?

Parents

1. How could we make our school and staff more welcoming?
2. What do you need to know about our students to help you help your child?
3. How can we support you and your family?
4. What would make your experience with our school better or more positive?
5. What is something we could have done differently for you or your child? Why?
6. How is our communication with you and your family? What method works best for you (notes, e-mail, Web site, telephone, etc.)?
7. What aspects of our school are the most confusing? What processes are the clearest?

Teachers

1. What support do you need with _____ (list initiative)?
2. What is the greatest need you have? What kind of support do you suggest?

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3. Which populations of students are the most challenging? Why? What would help you better meet the needs of these students?
4. How difficult is it to communicate with the parents of your students? What would help you?
5. Do you know how decisions get made at this school/district? Do you participate? What would make this process work better?
6. What kind of training format works best for you (workshop, coaching, video, book studies, student work analysis, lesson study, data review, cooperative planning, etc.)?
7. As an expert in your content area or grade level, what is the best advice you can give us for improving student achievement (meeting diverse student needs, choosing the strategies to teach new teachers, sharing the practices that have the highest payoff for students, etc.)?
8. What could we do to help you feel more involved as a valued member of our team, school, or district? Do you need to be better informed or more supported? Do you have access to the right resources to do your work?

Interview Follow-Up Ideas

1. What surprised you? Tell a partner and then share with the whole group.
2. What did you learn that should guide our work? List two examples.
3. Did anything you learned change your mind about our priorities, the direction we are heading, or the solutions we have chosen?
4. What else do you need to know to help move our work forward? Who else do we need to hear from?
5. What was the most powerful thing an interviewee said today? How will this influence your thinking and beliefs about our work?



Epigram

Purpose

One of the ways to discover effectiveness within an organization is to reflect on the organization from a different perspective. Epigrams are the short verses or expressions with which we all grew up. They are the expressions that capture the best wisdom in our culture. We repeat these epigrams so frequently that sometimes we lose sight of their important meanings. This group activity uses epigrams in a different context and applies them to a reflective conversation about schools. This can help school staff develop insight into the strengths and weaknesses of a school organization. It can also be a useful activity to help schools connect the Schools as Living Systems Framework to change in schools.

Preparation

Prepare a variety of epigrammatic statements on 3 x 5 index cards (see following). It is not necessary to have a unique epigram for every one pair. However, there should be at least 20 to 30 different epigrams.

Procedure

Time

40–60 minutes

1. Organize the room so participants meet in pairs or groups of three to engage in a conversation.
2. Following are examples of epigrams to consider in developing this activity.
 - Adapt or die.
 - Remove clots that block productive flow.
 - The whole is greater than the sum of its parts.
 - Education is the seed of life.
 - Learn to live, live to learn.
 - Nurture learning, watch it grow.
 - The difference between a flower and a weed is judgment.
 - Live, laugh, learn.
 - Education means mastering the waves of change.

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- Get rid of waste and dead tissue.
 - Storms come and go.
 - A single vine is weak, vines together are strong.
3. Alternative: Rather than use epigrams you have prepared, have participants prepare their own epigrammatic statements. Display a transparency of two or three as examples. Ask each participant to think of his or her favorite epigram and write it on a 3 x 5 index card. Collect the cards.
 4. Distribute the epigram cards you have prepared (or those generated by the participants) to each of the pairs or triads (give each group two or three from which to choose).
 5. Ask each group to apply a chosen epigram to the school. Ask the groups to indicate what the epigrams mean to its school in terms of the way the organization should operate or the core principles and procedures within the organization.
 6. List some of the important discovered observations on an overhead to share with the group.



Student Focus Groups

Purpose

Students, particularly high school students, can provide excellent feedback on the levels of rigor, relevance, and relationships. This can be done through a survey, but actual focused conversations with groups of students are an excellent way to gauge the level of what is happening in school.

Procedure

Select students randomly to include in focus groups. The groups should be approximately 8-12 students. Encourage students to be honest in their observations. The discussion is intended to measure the level of rigor, relevance, and relationships in the school. The purpose is not to evaluate any specific teacher, administrator, or student, so avoid referring to any teacher or student by name.

Time
30-40 minutes
for each group

As an option to ensure that students feel comfortable in sharing their perspectives, consider using third-party facilitators and recorders. Another option is to work with a partner school that is also interested in conducting student focus groups. Train student facilitators and then schedule them to conduct the focus groups in the other school. Students will be open and honest with a peer whom they do not know.

Following are potential questions to include in the focus groups:

- What is it about this school that you most enjoy?
- If a new school leader came to this school with many ideas to make changes, what would you argue strongly should never be changed?
- If a new school leader asked you what should definitely be changed, what would be first on your list?

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- Are most students challenged in their work, or can you slide through classes?
- Do you think that you are adequately prepared for the next level of education?
- What are examples of work you do in classes that makes you think?
- What are examples of work you do in classes that definitely will be useful — work that applies to the real world?
- What are examples of teachers' actions that show they care about you and how well you do in school?
- What are examples of teacher or staff actions that show that they do not care about you or respect you?
- What are some activities that have helped you to get to know other students?
- What are ways that teachers provide additional help when you need it, and how often does that occur?



Book Study Group

Purpose

Book study groups are an effective form of professional development that can be used by educators at all levels. Reading a common education-related book gives a starting point for conversation and avoids slipping back into discussions about past or current practice. The book study group is a way to build a consensus around innovative practices that might be considered in your school. The book study group can be facilitated by any member of the staff and is often rotated.

Procedure

The following five steps explain the process of book study groups, from forming a group to implementing the discussion and follow-up strategies.

Step 1. Form a Book Study Group

Time

Varies. Study groups usually meet for no more than one hour.

Book study groups work best when they include less than 15 people. Small groups of less than five may not provide sufficient interaction or variety; larger groups make it difficult to allow all members to participate actively. If you have a large staff, divide the group into smaller study groups. It is helpful if the group is composed of individuals with similar interests or working with common groups of students, although varying viewpoints are important because they provide diversity of opinion and discussion.

The group should determine a schedule for reading and discussion. The schedule should permit time for group members to complete the reading assignments. However, the schedule should not be so extended that participants forget what they have read and discussed between meetings. Most groups settle on weekly or biweekly meetings. Usually book clubs meet face-to-face, but some clubs are successful using asynchronous online conversations.

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Consider the meeting length. One hour usually works well for a schedule of four to eight meetings. Focus on the book study during the meetings, rather than being distracted by other school issues. Refreshments are always a good idea. Keep the meetings friendly, yet purposeful.

Step 2. Choose a Book and an Objective

Choose a book on a topic that interests everyone in the group but is sufficiently open-ended to encourage new learning through reading and discussion. It should be thought-provoking and with enough depth to stimulate debate. Give group members an opportunity to choose and recommend books.

Questions to consider while choosing a book include: Why read this book? What does the group want to learn? The study group should clearly determine one or more learning objectives before completing reading.

The book's length also needs to fit within a reasonable schedule. Longer books will mean either heavy reading assignments or an extended schedule.

Step 3. Decide How to Read the Book

Some books should be read by all group members. For example, a first assignment might be to read chapters one through four, followed by discussion, and then carry on in a similar fashion. In other cases, it makes sense for members to read different parts of a book and then report back to the group during scheduled meetings. For example, this procedure works well with collections of essays. Whichever approach is chosen, it is a good idea to develop a series of discussion starters—questions or challenging statements that stimulate discussion. These starters can be framed for before reading, during reading, and after reading.

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Step 4. Read and Discuss the Book

Follow the schedule. Some groups find it beneficial to choose a discussion leader to get the ball rolling and a recorder who will summarize the discussion. Make connections between the text and real-life examples. Consider questions such as: How are the ideas in this book important to my professional life? How can I use what I learn?

Step 5. Evaluate the Book and Plan for Future Book Study

At the conclusion of the book study, take time to consider questions such as: Did the book stimulate thought and discussion? Did the group study meet the learning objectives? How might the group study experience be improved? Taking such evaluation into account will allow the group to bring in new members, re-form, or simply continue on, developing a new “cycle” of study.

Recommended Reading on High School Change

National Association of Secondary School Principals. *Breaking Ranks II: Strategies for Leading School Reform*, Reston, Va: 2006

Bridgeland, J.M. et al. *A Blueprint to Address America's High School Dropout Crisis*. silentepidemic.org, 2007

Calisi Corbett, G., T. A. Huebner, et al. *Rethinking High School: Preparing Students for Success in College, Career, and Life*. WestEd, 2007

Collins, J. *Good to Great*. New York: HarperCollins, 2001

Daggett, W. "The Education Challenge: Preparing Students for a

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Changing World.” Paper presented at the International Center’s 2006 Model School Conference in Kissimmee, Fla. www.leadered.com

Daggett, W. *Rigor and Relevance from Concept to Realty*. International Center for Leadership in Education, 2008

Davenport, P. and G. Anderson. *Closing the Achievement Gap*. American Productivity and Quality Center, Houston, Texas: 2002

Friedman, T. L. *The World Is Flat*. New York: Farrar, Straus and Giroux, 2005

Horsch, P., J.-Q. Chen, *et al.* "Rules and Rituals: Tools for Creating a Respectful, Caring Learning Community." *Phi Delta Kappan*, 1999

Pink, D. H. *A Whole New Mind*. New York, NY: Riverhead Books, 2005

Sergiovanni, T. *Strengthening the Heartbeat: Leading and Learning Together*. San Francisco, Calif: Jossey-Bass, 2004

Partnership for 21st Century Skills. *Results the Matter: 21st Century Skills and High School Reform*, 2006

Brown University. “Student-Centered High Schools.” *Perspectives on Policy and Practice*, 2001



Parent Survey

Purpose

Parent perspective is important in determining if the school is meeting the needs of students.

Procedure

This survey is a version of the International Center's 10 Key Components of School Improvement converted into a parent survey form. Use this with parents to gather feedback on strengths of the school and areas in need of improvement.

Parent Survey

Time
15-20 minutes
to complete the
survey

Directions: Our school is committed to the following 10 Key Components of School Improvement. This survey will be used to collect feedback from parents on the degree to which the schools is achieving these characteristics. Your observations are welcome and appreciated. Check **Yes** if you think this characteristic exists, **No** if you think it does not, and **NMI** if you need more information.

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Name(Optional)_____Date:_____

A Culture that Embraces Rigorous and Relevant Learning

Yes	No	NMI	
☐	☐	☐	Do students know why they are learning?
☐	☐	☐	Are students given opportunities to apply what they have learned?
☐	☐	☐	Are students active and working in classrooms?
☐	☐	☐	Are the most able students challenged?
☐	☐	☐	Does the school help prepare students to live in a culturally and ethnically diverse society?
☐	☐	☐	Does the school foster development of sound character, democratic values, ethical judgment, and good behavior?

Data-Driven Decisions

Yes	No	NMI	
☐	☐	☐	Is student achievement measured frequently?
☐	☐	☐	Are multiple measures used to measure student achievement?
☐	☐	☐	Do parents get regular reports on student achievement?
☐	☐	☐	Does the school have specific quantifiable goals for student achievement?
☐	☐	☐	Do students get feedback on their work?
☐	☐	☐	Over a period of years, are test scores improving?
☐	☐	☐	Do teachers check and grade homework regularly?
☐	☐	☐	Does the school survey parent satisfaction?
☐	☐	☐	Does the school survey former students for success?

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High Student Expectations, Monitored for Continuous Improvement

Yes	No	NMI	
☐	☐	☐	Are there high expectations for all students?
☐	☐	☐	Does the school display examples of excellent work?
☐	☐	☐	Are the students interested in what they are doing?
☐	☐	☐	Do struggling students get help?
☐	☐	☐	Do teachers provide clear expectations for the class and outline required student work?

Organized Curriculum that Drives Instruction

Yes	No	NMI	
☐	☐	☐	Does the school have a clear written philosophy or mission?
☐	☐	☐	Does the school work to achieve its mission?
☐	☐	☐	Is curriculum tied to state standards?
☐	☐	☐	Do the principal and teachers refer to the school goals?
☐	☐	☐	Is there an emphasis on a particular approach to teaching and learning that is carried out through all instruction?
☐	☐	☐	Do the teaching materials seem up to date?

Real-World Applications

Yes	No	NMI	
☐	☐	☐	Does student work include meaningful, real-world application of skills and knowledge?
☐	☐	☐	Do teachers explain how learning will be used in the real world?
☐	☐	☐	Does the school have examples of interdisciplinary instruction?
☐	☐	☐	Does the school have active community advisory committees with input on curriculum?
☐	☐	☐	Does the school require or encourage community service?

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Multiple Pathways to Rigor and Relevance

Yes	No	NMI	
☐	☐	☐	Are there multiple course options for students to meet core academic requirements?
☐	☐	☐	Are there options for students to take extra time to meet standards?
☐	☐	☐	Does the school offer extensive options in athletics, drama, music, art, or other activities?
☐	☐	☐	Are core math, language arts, and science skills connected to career and technical instruction and the arts?
☐	☐	☐	Are there school programs that meet your child's needs?

Sustained Development of Highly Qualified Staff

Yes	No	NMI	
☐	☐	☐	Do the teachers have a background in the subject they are teaching?
☐	☐	☐	Are many teachers teaching outside the field in which they are certified or hold a degree?
☐	☐	☐	Is there a high turnover rate for teachers?
☐	☐	☐	Do teachers have opportunities for professional development?
☐	☐	☐	Do new teachers receive support to enhance their skills?
☐	☐	☐	Does the school recognize and reward excellent teacher performance?

Parent and Community Involvement

Yes	No	NMI	
☐	☐	☐	Does school staff welcome and encourage parent involvement?
☐	☐	☐	Are there expectations and/or requirements of parents?
☐	☐	☐	Are there parent volunteers?

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☐	☐	☐	Are there ways the school communicates with families?
☐	☐	☐	Are other community members involved in the school?
☐	☐	☐	Does the school have partnerships with businesses or other institutions?
☐	☐	☐	Are parents involved in decisions about the education of their children?
☐	☐	☐	Does the school have a parent advisory or policy group such as a site council?
☐	☐	☐	Do all the ethnic groups in your community have a representative voice in school policy-making?

Safe and Orderly School

Yes	No	NMI	
☐	☐	☐	Do you feel comfortable walking into the school?
☐	☐	☐	Do students treat others well?
☐	☐	☐	Is the building clean and well maintained?
☐	☐	☐	Are the restrooms clean and neat?
☐	☐	☐	Do students appear happy and relaxed?
☐	☐	☐	Are the buildings well organized and adequate for the number of students?
☐	☐	☐	Are there clear rules for discipline that are enforced fairly and consistently?
☐	☐	☐	Are there positive rewards for good behavior?
☐	☐	☐	Are there well-established levels of discipline for different infractions?
☐	☐	☐	Are students taught methods of resolving conflicts?

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☐	☐	☐	Are there standards for student behavior?
☐	☐	☐	Do students know what these standards are?

Effective Leadership

Yes	No	NMI	
☐	☐	☐	Is there stable leadership in the school?
☐	☐	☐	Is the principal visible throughout the school?
☐	☐	☐	Is the principal knowledgeable about instruction and school activities?
☐	☐	☐	Are the roles of other administrators clearly defined?
☐	☐	☐	Are faculty, staff, parents, and/or students involved in school planning and decisions?
☐	☐	☐	Are important decisions about the school made by school personnel rather than by district staff?
☐	☐	☐	Is the school or district developing future school leaders?
☐	☐	☐	Is the principal respected by staff and students?



Process



School Crest

Purpose

The purpose of this team project is to stimulate conversation and team reflection in their core beliefs about the school. Teams are asked to create a drawing of a school crest that depicts the school. This can be used as part of a visioning process or to evaluate the degree to which teams have embraced an agreed upon vision. It is a fun activity that gets teams involved in a project, encourages their creativity, and also stimulates some shared understanding of core beliefs. This can be used as a warm-up team building activity as part of a full day workshop.

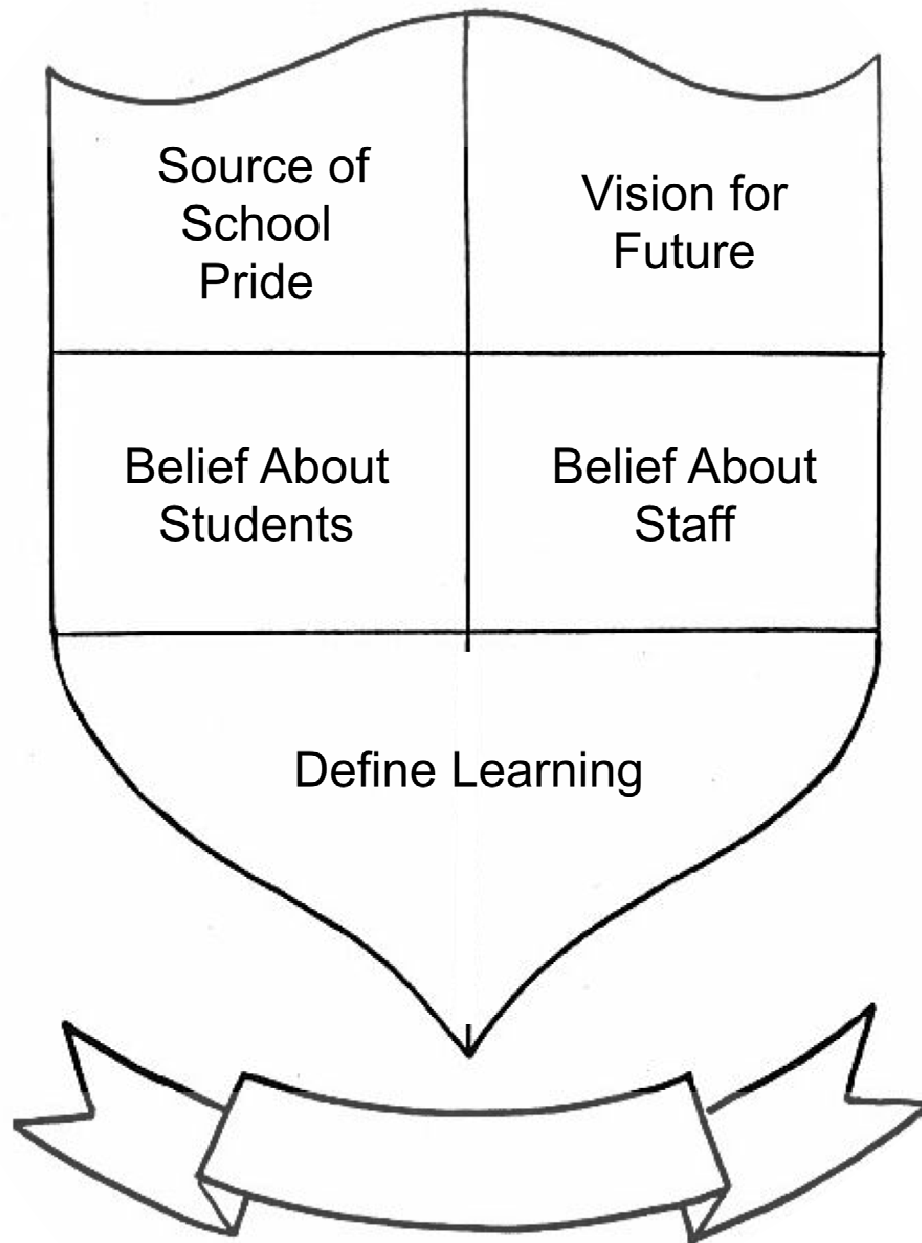
Procedure

Time

30 minutes

1. Give each team (6-8 people) a blank sheet of chart paper and colored markers. (Note that this can be done on a regular 8 ½ x 11 sheet of paper, but it is hard to display and share the results of the team's drawing.)
2. Show the teams the sample school crest (see next page).
3. Ask each team to draw a school crest that includes images in each of the five areas that represent the following five aspects of the school:
 - Source of School Pride
 - Vision for the Future
 - Belief about Students
 - Belief about Staff
 - Definition of Learning
4. Teams cannot use any words, they can only draw images.
5. After each team has completed its work, display the crests and have teams explain the images they chose.
6. Have the teams reflect on similarities and differences.

Sample School Crest





Brainstorming

Purpose

Brainstorming is a technique used to create solutions for problems. It involves generating a list that includes a wide variety of related ideas. In a group setting, brainstorming can be extremely effective. Participants not only come up with new ideas, but also build on associations from other people by developing and refining them. Better ideas are created through group brainstorming than individual responses to questions or problems.

Procedure

Ground Rules for Brainstorming

Before beginning any effective brainstorming session, ground rules must be set. Ground rules for person-to-person interactions are established to make the most of the brainstorming session. These rules should be respected as a way to foster teamwork and creativity. When these ground rules are violated, people stop being creative.

Time

Varies depending on the issue, usually 5-20 minutes

When teams create their own rules, they are more meaningful. Try performing a mini-brainstorming session around creating brainstorming ground rules. This activity provides a nice opportunity to practice the skills necessary for an effective brainstorming session. It also allows the team to take ownership of acceptable and unacceptable behaviors. The facilitator should only participate in the brainstorming session if key rules are not mentioned. Once the list of rules has been created, gain consensus that the session will be conducted according to these rules. Post them in the room.

Here are four key ground rules that are useful when conducting a brainstorming session:

- **There are no bad ideas.** It is a brainstorming session, not a serious matter that requires only serious solutions. Remember, this is one of the fun tools of group processes, so keep everyone involved.

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- **Do not criticize other people's ideas.** This is not a debate, discussion, or forum for one person to present advantages or seek a better solution.
- **Build on other people's ideas.** Often an idea suggested by one person can trigger a bigger and/or better thought by another person. A variation of an idea on the board could be the solution to the problem at hand. It is this building of ideas that leads to out-of-the-box thinking and great ideas.
- **Quantity over quality.** Brainstorming is about quantity, the more creative the ideas, the better. As a facilitator, challenge your team to develop as many ideas as possible, and compare this team's performance to previous brainstorming sessions.

Steps in Brainstorming

Successful brainstorming sessions keep the following procedures and characteristics in mind:

1. Include participants from a wide a range of disciplines and with a broad range of experiences. Diversity brings many more creative ideas to the session.
2. Define the problem you want solved clearly, including all criteria that must be met.
3. Set a time limit. Time should vary depending on the complexity of the issue. In any case, keep it short – 5 to 20 minutes. Time constraints often push people to think more quickly and share more openly.
4. Keep the session focused on the problem at hand.

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5. Prevent criticism or evaluation of ideas during the session. Criticism introduces an element of risk for group members when putting forward an idea. This stifles creativity and cripples the nature of a good brainstorming session.
6. Encourage participants to be enthusiastic and uncritical. Try to get everyone to contribute and develop ideas, including the quietest members of the group.
7. Have fun. Encourage team members to come up with as many ideas as possible, from solidly practical ones to wildly impractical ones.
8. Encourage people to develop other people's ideas or to use other ideas to create new ones.
9. Appoint one person to write down ideas that come out of the session. Writing ideas on a flip chart or board adds to the credibility of the brainstorming session because it affirms to the author of the idea that his or her idea was captured.

Questions to Consider While Preparing a Brainstorming Session

- Who will lead or facilitate the brainstorming session?
- Who will participate in the brainstorming session?
- Who can quickly record the brainstormed ideas without slowing down the group?
- Where will the brainstorming session be held?
- What materials are needed (easel, flip chart, white board, pens, etc.)?
- What is the goal of this session?

Ideas for More Effective Brainstorming

SMARTBoard technology allows the information written on the Board's surface to be saved as a computer file. The SMARTBoard provides a neat visual display of ideas for the group with the added convenience of recording the ideas automatically in electronic form. This functionality ensures that your ideas will not be lost and can be accessed and reviewed at any time. Saving your ideas to a computer file also eliminates the need for individual note-taking during the session and leaves everyone participating.

E-brainstorming allows group members to meet virtually through the use of a computer. Like group brainstorming, e-brainstorming works best when all participants are present at the same time. A facilitator is essential to this process. The facilitator compiles the suggestions and sends them out for review and follow-up at different intervals. Although this method can be less spontaneous than face-to-face brainstorming, it has several advantages. Anonymity through the computer can empower shy or insecure members and can also prevent intimidation by higher-ranking staff members.

Word association involves brainstorming lists of words and then finding relationships between key words on each list. For example, imagine you want to create a new motto for a school. You could start with the root word "your school" and use word association to come up with a list of single-word ideas to describe the school, such as "success, fun, wisdom, rigorous." Then you could brainstorm other lists for each word until you have several groups of words. In the end, there might be seven or eight groups based on one word association. The motto may be created using a word from each of the lists and creatively linking them together.

Opposite ideas help team members think "outside the box." Instead of thinking about how a problem can be solved or how a situation

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can be improved, take the opposite approach. Brainstorm a list of ways to make things worse. Taking this approach can often open up new avenues of ideas when brainstorming positive solutions later.

Paired brainstorming is done in partners instead of a group. Divide participants into pairs and have each person offer a rapid-fire response. Encourage partners to keep giving answers back and forth—even if they get off track—until neither can think of anything further. Collect the ideas from each pair and compile into a total group list.

Plan-ahead brainstorming allows participants extra time to think about the problem at hand. Alert participants of the problem or challenge a few days before the brainstorming session. Ask them to bring ideas to the meeting.

Carrot-and-stick brainstorming motivates participants to work past “brain blocks” or other hindrances. While facilitating a brainstorming session, be prepared to offer ideas that will help stimulate participants if they get stuck or start looking at the challenge from only one perspective. When ideas start to slow, push them to generate “x” more ideas. Providing a time constraint can also help. Entice participants to come up with more ideas with a “door prize.” This can simply be a bag of candy given to the first person who can come up with five more ideas.

Reflective brainstorming requires participants to write ideas down on paper or index cards about the issue or problem at hand. Collect all of the ideas and redistribute them. It does not matter if participants get their own ideas. Taking turns, have each person read the idea they were given out loud. This allows the ideas to be presented anonymously and may enable some ideas to come up that participants might otherwise be uncomfortable presenting. When all the ideas have been read, begin team brainstorming.

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Add an idea is a technique used to brainstorm on paper, instead of out loud. Give each participant a stack of index cards. Have each person write down their idea and then pass the card to the left. On the new card, he or she should read it, write another idea, and then pass the card to the left. This continues until each card has been passed to each person. If someone can not think of an idea, he or she should write a question, and other people can start answering it. Rounds are slower in this form of brainstorming because people need more time to read ideas and answer questions. However, it is an excellent way for people to comfortably share ideas if public speaking is an issue. The facilitator then collects all the cards and sorts them into categories.

Free writing allows participants to select and organize materials in a way that makes sense to them before talking about it with others. Free writing allows participants to “think out loud” on paper without concerning themselves with clarity and correct grammar; it is simply a tool to get ideas from their heads to paper. Some people are more comfortable drafting their ideas individually rather than shouting them out in a group.



Futures Wheel

Purpose

This activity is a variation on brainstorming which focuses on the impact of change by identifying likely consequences and needs. The futures wheel is a technique to examine the most likely consequences from a specific trend or decision. It asks individuals in small groups (6–8 people) to agree on potential consequences of the selected trend or potential decision. This enables a group to examine thoroughly the impact on the organization. The activity can also be used as an icebreaker at the beginning of a workshop.

Preparation

- Identify clear changes, events, or trends, which are placed in the center of the Futures Wheel (e.g., new student assessment, policy, or schedule change).
- Orient facilitators.
- Prepare handouts and/or easel chart for groups to work on.

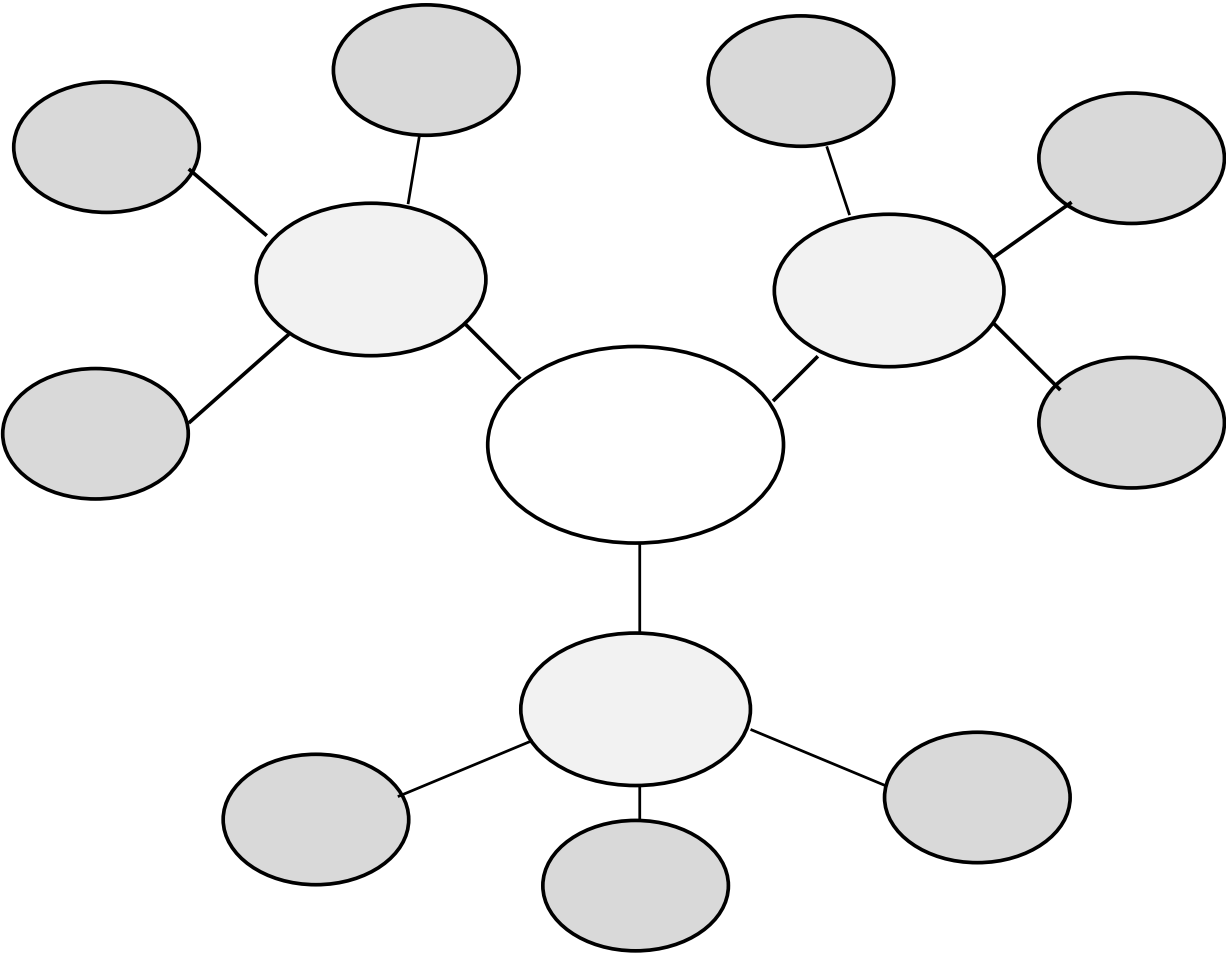
Procedure

1. Write the trend or decision the group is focusing on in the center circle.
2. Write three consequences of that trend or decision in the connecting circles. At least one should be positive and another negative. The group should work to achieve consensus on what consequences to include.
3. Based on the initial consequences, the group should list second- and third-level consequences. The total list of consequences gives some indication of the impact of a trend or decision. The results of “wheel” brainstorming can be written in the form of a final list or narrative.

Time

30-60 minutes,
depending on group
size/complexity of
questions

Futures Wheel Chart





Force Field Analysis

Purpose

An organization can be considered balanced among several forces, often working in opposite directions. No change will take place unless an imbalance of these forces occurs. A method of planned change called force field analysis was developed by Kurt Lewin.

Forces moving toward the change are called “helping forces.” These are opposed by an equal number of forces against the change called “hindering forces.” Change can be planned by first analyzing the helping and the hindering forces. Once these are clearly identified, it is easier to achieve the change by (1) reducing or eliminating a hindering force, (2) strengthening a helping force, or (3) changing the direction of any force.

Typically, when groups assemble, they focus on problems, which results in talking about overcoming obstacles. This activity helps to clarify both negative problems and positive influences.

Preparation

Organize the room so participants can meet in small groups of no more than 8-10 people. Have newsprint to record responses. Designate and orient a facilitator to lead each group.

Procedure

Time

30-40 minutes

1. Identify a primary goal or change that is proposed.
2. Have each group list the hindering forces — obstacles to making the change or achieving the goal (it is often easier to start with hindering forces).
3. Have them list the helping forces — the positive features that would support making the change or achieving the goal.
4. Once the lists are complete, prioritize the items, and select 3-5 of the most significant helping and hindering forces.

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5. Work with each of the forces and brainstorm specific action steps that will strengthen helping forces, reduce hindering forces, or change the directions of forces. These lists of possible actions provide good ideas for further development of work plans.



Metaphors

Purpose

According to Merriam-Webster Dictionary, a metaphor is “a figure of speech in which a word or phrase literally denoting one kind of object or idea is used in place of another to suggest a likeness or analogy between them.” Metaphors can help individuals examine a problem or issue from a different perspective by highlighting different relationships or characteristics. Organizations often operate in crisis mode trying to solve individual problems. Frequently individuals do not step back and think about the problem from many perspectives. This group discussion activity encourages individuals to think “outside of the box” and also brings in an element of humor, which helps to place an issue in a less threatening context. This activity works best when a large group is addressing a problem within the organization. It may also be used to assess the general morale and characteristics of an organization.

Preparation

- Identify the problem or issue or allow participants to select their own.
- Create a worksheet for individuals to use to support the conversation. This worksheet can be a simple two-column chart. Label the left-hand column “Problem/Metaphor” and the right-hand column “Characteristics.” Participants write the problem in the first column. In the second column, participants write characteristics of their metaphor that apply to school and their problem.
- Prepare a list of metaphors to share with the group. An example of metaphors used to describe business organizations or business problems relates to sports teams. These types of metaphors often address the characteristics of competitiveness, team spirit, and unique individual characteristics.

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Procedure

Time

1-2 hours

Review the steps in the metaphor process.

1. Divide participants into groups.
2. Each group will review the identified problem.
3. Explain how metaphors may be used to further define and sometimes give new perspective to a particular problem. Walk the entire group through an example of using a metaphor to analyze a particular issue. Say: "For example, a school is like a garden. The year starts with great anticipation. There is a lot of work in preparation by the gardener before it is time to plant. Plants grow slowly just like children change slowly. Constant attention is necessary to protect the young plants and young children from the harsh environment, pests, and weeds. When the plants fully develop, the gardener takes great pride in the results, and it is hard to image how the transformation from seed to mature plant was accomplished."
4. Answer any clarifying questions.
5. Allow time for each group to brainstorm a number of metaphors that may describe the problem.
6. Using the worksheet, groups select a metaphor and brainstorm characteristics of the organization or issue which are represented by the metaphor.
7. Allow time for each group to share individual metaphors and descriptions with all participants.



Affinity Diagram

Purpose

The Affinity Diagram enhances brainstorming as a strategy for developing new ideas or solutions to a problem. It organizes large sets of ideas generated during a brainstorming session into smaller sets of related items. An Affinity Diagram is especially useful in clarifying a complex problem or a situation that appears to be overwhelming. The process of constructing an Affinity Diagram helps identify and make connections between all issues before the team moves toward consensus solutions.

Preparation

Clearly define the problem that needs a solution.

Assemble the following materials:

- sticky notes or index cards (various colors)
- flip chart pad and easel
- color coding labels (3/4" round)

Procedure

Time
45-60 minutes

1. State the problem or issue.
2. Review the rules:
 - Write each idea on a separate sticky note or card.
 - Keep ideas short (fewer than six words).
 - Work quickly and silently.
 - Feel free to add new note cards anytime during the process.
3. Instruct members to brainstorm individually as many ideas/ comments/solutions as possible. Have them write each idea on a separate sticky note or card. After approximately 5 minutes, ask each member to read their comments aloud. Remind participants to never criticize or judge ideas.

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4. Post each sticky note or card on a wall or board for all members to see.
5. Quickly group related ideas. These similar comments are said to have an “affinity” to each other. During this grouping process, note cards may be moved any number of times, and new groupings may be created. Teams should avoid having more than 8 to 10 cards per grouping and should look at creating a new category if cards exceed this recommended number. If team members disagree about the placement of a particular idea, make copies of the contested idea and place it in more than one group. Allot approximately 10 minutes for this activity.
6. Read all the cards and have team members identify an appropriate name or label for each grouping. The goal of the discussion is to label each group of ideas or comments as quickly as possible. The facilitator writes a heading card for each group. The team may label a group “Miscellaneous,” if necessary.
7. Tape the sticky notes or cards onto flip chart paper with the heading card at the top of the column. This is the final product—the Affinity Diagram.
8. Discuss each grouping and how the ideas relate to solve the problem. Card authors may expand or elaborate on their ideas. Encourage participants to avoid criticizing or judging the ideas.
9. Prioritize the groupings. Have each team member individually place stickers on the groups that he or she thinks is priority. To get a full picture of the issues to address, have participants use two different criteria and vote for items that he or she feels is most important. Vote for one that is the easiest to change and the school has the most control over. Vote for a second

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that will have the biggest impact or make the most difference. Have participants use different color stickers for each criterion. If there are a large number of groupings to select from, give each participant multiple “votes” with multiple stickers.

10. The “weighted” or “ranked” Affinity Diagram is used as a guide for the team to write an Action Plan. This plan should list the priority groupings as tasks to be completed first or in the shortest time frame.



Digging to Root Causes

Purpose

One of the keys to solving a problem is to first truly understand it. People are often too quick to “fix” a problem before they really understand it. It is easy to see a symptom and assume what is causing it. Often, however, taking the time to explore more deeply shows that what was thought to be the cause is in fact just another symptom, and that the problem lies much deeper within. This is called a root cause, an underlying problem that is unseen and the real cause of the symptom that is seen.

One technique, borrowed from Japanese manufacturing management theory, is to ask repeated questions to dig deeper to explore root causes. This method is used to help identify the real causes of problems that occur on the manufacturing floor. The goal is not to simply correct the effects of the problem, but to find the root cause of why the problem is occurring to ensure that it will not happen in the future.

One simple way to do this is called asking “why” five times. The idea is that by the time the question “why” is asked the fifth time, the root cause is found. It is not always that simple, but the exercise can be surprisingly insightful in helping to discover what is really happening, and can help avoid “quick fix” solutions that do not resolve anything. It is especially useful for tackling chronic problems that occur repeatedly in a system; it is less useful for problems that are unlikely to recur.

For example, a conversation digging for root causes may go something like this.

Question: “What is the problem?”

Answer: “Absenteeism, students don’t come to school.”

Question: “Why don’t students come to school?”

Answer: “They don’t care about school.”

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Question: "Why don't they care about school?"

Answer: "They are bored."

Question: "Why are they bored?"

Answer: "Instruction is often boring."

Question: "Why is instruction boring?"

Answer: "Teachers need to review basic skills that students lack."

Question: "Why do teachers spend so much time reviewing basic material?"

Answer: "We eliminated the tutoring program."

In this example, if a team had jumped to solve the problem of student absenteeism, they might have put incentives in place to reward students for good attendance. By digging into the problem with repeated questions, the team made a connection between the loss of the tutoring program, boring instruction, bored students, and absenteeism. Now the team can begin to address the underlying root cause and not simply try to fix a symptom.

Procedure

Time

1 hour or more

1. Identify the issue that your team or your school wants to explore. For example, "Why do students struggle meeting state proficiency in algebra?"
2. Invite participants to write an answer to the stated problem. Go around the group and have each person give a response aloud for the entire group to hear. Record every answer on chart paper posted on the wall. List initial response with space to record subsequent answers to additional questions. For example, use a separate sheet of paper for each initial response.
3. Repeat the process of asking "why" for every statement recorded on the wall. Continue that pattern until you have asked "why" five times for each response.

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4. After listing all the responses, debrief the responses to determine if the group has identified one or two solutions for addressing the problem. Look for patterns across the responses, and the true root cause will begin to emerge. If the situation is complex, the facilitator may choose to adjourn and reconvene the participants at a later time.
5. Variation: Break a larger team into groups of three. Instruct each small group to ask five questions and come up with the five answers. When all small groups have finished, list all the responses on chart paper for all to see and discuss.



Bumper Clumper

Purpose

This is an effective group brainstorming and sharing technique that can be used to pinpoint popular opinions of a group. For the leader or facilitator, it is a creative way to discover the opinions of a large group.

Preparation

This activity requires 3 x 5 index cards (three per person). The meeting room needs to be large enough for group members to move around. The facilitator should create a series of example sentence starters to be used during the activity. Each example should be written on a separate index card.

Procedure

Time

15-20 minutes

This can be done at any time during a meeting or as an effective icebreaker at the beginning of a workshop.

1. Pass out three index cards to each person with sentence starters on them.
2. Have participants jot down opinions to complete a particular sentence starter on each card. (Example: "The three most important skills a student should learn are")
3. Collect the cards.
4. Shuffle them and add in example sentence starters. (To make the procedure work more smoothly, as well as to enrich it, prepare additional cards ahead of time.)
5. Redistribute three cards to each person.
6. Instruct members to rank their cards in order of perceived importance.
7. Ask group members to exchange cards with other group members to try and collect three cards that best represents their

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own thinking. Each person must always have a total of three cards. It may be useful to give a time allotment for this portion of the activity.

8. Instruct individuals to form coalitions of like-minded people. Say “Searching for the cards that best expressed your ideas should have helped you learn what others value with regard to the topic. Now find kindred souls who can agree on a total of three cards, discarding all others.” It may be useful to give a time allotment for this portion of the activity.
9. Invite coalition groups to share their findings with the large group. It may be necessary for each coalition group to choose a speaker. Discussion or reactions may follow.



Jigsaw Discussion Groups

Purpose

Jigsaw discussion groups allow multiple topics and perspectives to be reviewed. Like a jigsaw puzzle, it involves many different pieces. However, the “pieces” for this activity are actually different perspectives or aspects of a particular topic. A jigsaw group is made up of individuals assigned to look at a particular topic from various viewpoints. This technique is an excellent cooperative learning strategy in the classroom. It can also be used in the conversations among professionals around issues such as rigor, relevance, and relationships.

Procedure

Time

30-90 minutes
depending on topics

Sources: E. Aronson
and Robert Slavin

1. Select a major problem or issues and identify 4-8 topics that relate to that issue. For example, topics related to relationships might be:
 - structural positive forces
 - structural obstacles
 - positive teacher behaviors
 - negative teacher behaviors
 - good practices and procedures
 - poor practices and procedures
2. Divide participants into groups that contain the same number of people as aspects for the topic to be discussed. The exact number of groups will depend upon the number of participants. The groups should be diverse in terms of age, background, and subject area. This group is referred to as a “jigsaw group.”
3. Assign each participant within each group one part of the issue that is to be discussed (there may or may not be an article that relates to this topic). It is expected that the individual will become an “expert” on this aspect of the topic. For example, if the main topic is relationships, one aspect may examine school

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structures that encourage relationship building, another aspect may look at structural barriers to relationships, a third explores positive teacher behaviors, and a fourth considers negative teacher behaviors. Each person in the group is assigned one aspect.

4. Allow time for participants to discuss the broad topic within their jigsaw group.
5. Break up jigsaw groups into “expert groups.” Have all participants assigned to the same aspect of the topic move to common groups.
6. Explain that participants should discuss their assigned aspect in detail in their expert groups. Participants may raise any questions they have, highlight key findings in their topic, brainstorm solutions, and/or discuss what they will share when they return to their original jigsaw groups.
7. Have participants return to their jigsaw groups. Each group should choose a facilitator and a timekeeper.
8. Ask the facilitator to encourage each participant to share his or her expertise with the group, allowing time for clarifying questions. Participants should take notes on each presentation. The timekeeper should ensure that a representative from each group has appropriate time to speak.
9. Allow time for groups to make appropriate recommendations or solutions relating to the main topic of the activity.



Team Effectiveness Inventory

Purpose

Throughout this kit, many references have been made to the importance of teams. Teams just don't happen when staff are assigned to groups. They are built through common experience, training, and activities. There are many excellent team-building activities. What is most important is to give teachers opportunities to build strong, collaborative working relationships.

Procedure

The following survey can be used as a self-inventory for teams to reflect on their current state in the formation process. Have each member of the team complete the inventory and then discuss strengths and areas in need of improvement.

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Team Inventory Checklist					
5	4	3	2	1	5=Strongly Agree, 4=Agree, 3=Neutral, 2=Disagree, 1=Strongly Disagree
Clear Common Purpose					
☐	☐	☐	☐	☐	We have a clear sense of our collective goals and priorities.
☐	☐	☐	☐	☐	Our goals are challenging yet achievable.
☐	☐	☐	☐	☐	Team members are highly committed to our goals, placing less priority on individual goals or interests when necessary.
Team Processes					
☐	☐	☐	☐	☐	We have effective processes for sharing information.
☐	☐	☐	☐	☐	We have effective processes for solving problems, making decisions, and running meetings.
☐	☐	☐	☐	☐	We have effective processes for ensuring individual accountability and coordinating individual efforts.
Group Dynamics					
☐	☐	☐	☐	☐	Team members listen to, respect, and understand each other.
☐	☐	☐	☐	☐	Conflict is dealt with openly and is considered important to decision making and personal growth.
☐	☐	☐	☐	☐	We are a supportive, cooperative, and cohesive group.
Interpersonal Relationships					
☐	☐	☐	☐	☐	I trust the members of my team.
☐	☐	☐	☐	☐	Members feel their unique personalities are appreciated and well utilized.
☐	☐	☐	☐	☐	Team members contribute equally.
Satisfaction					
☐	☐	☐	☐	☐	I enjoy working with my team members.
☐	☐	☐	☐	☐	I am able to make good use of my skills and abilities on this team.
☐	☐	☐	☐	☐	Considering everything, it is a pleasure to be on this team.
Support					
☐	☐	☐	☐	☐	We have adequate time to meet as a team.
☐	☐	☐	☐	☐	We have access to data and information we need to make decisions.
☐	☐	☐	☐	☐	We have adequate training in the skills we need.

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Facilitator. The facilitator, or team leader, manages the team. This person is key to the consistency and long-term continuity of the team, its ongoing work, and its accomplishments. Thus, this role usually is not rotated. The facilitator:

- ensures the meeting purposes are clear
- prepares an agenda planned in advance
- keeps the team on task on the agenda items
- ensures the group's adherence to established norms
- creates opportunities for all members to participate
- helps members actualize their potential
- provides team reflection time

Timekeeper. This individual keeps the team on schedule. This person:

- attempts to make sure agenda items keep to time allotted
- reminds group of limited time left to address agenda items
- suggests time changes on an item during the meeting or revising the agenda

Recorder. The recorder keeps an accurate, objective record of the meeting. This individual:

- records actions agreed to by the team
- prepares the meeting minutes for distribution to team members
- communicates with others outside the team (optional)

Process Consultant. This person is an “observer” of how the team functions by evaluating how well the group follows group norms. The process consultant:

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- observes patterns of communication and behavior
- provides reflective feedback at the end of the meeting on the team's effectiveness and achievements

Have teams use the Team Problem-Solving form in the next activity to identify one problem on which the team will focus in a regular team meeting. List the data used to define the problem. Then brainstorm actions to take and the data that will be used to evaluate the effectiveness of actions taken.



Productive Team Meetings

Purpose

To ensure productivity during meetings, adhere to ground rules and group norms. Time needs to be allotted for staff to hold meetings, and additional time should be set aside for reflection on the group's ability to keep to established roles, procedures, and values. Depending on the group and its work, district and/or building leadership provides support.

Preparation

Prepare group/team functioning tools to be used when a group is established or as needed with an existing group. The following tools are provided:

- Team Problem-Solving Form
- Effective Decision-Making Checklist
- Effective Meetings Checklist
- Meeting Roadmap
- Sample Meeting Ground Rules
- Minutes of Meeting Sample Format

Procedure

Provide the team/group members with tools to assist them in carrying out their roles and responsibilities and to ensure a process that will lead to productive results.

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Team Problem-Solving Form

Identify one problem on which the team will focus in a regular team meeting. List the data used to define the problem. Then brainstorm actions to take and the data that will be used to evaluate the effectiveness of actions taken.

Identified Problem	
	Data to Identify Need
Actions to be Taken	
	Data to Measure Results

Effective Decision-Making Checklist

Use this checklist to evaluate the effectiveness of your decisions.

Yes	No	
☐	☐	Everyone was familiar with the decision method being followed, e.g., consensus, majority vote.
☐	☐	Enough time was devoted to the item.
☐	☐	The facilitator was objective and open-minded in facilitating discussion of the item.
☐	☐	The item voted on was clearly stated and understood.
☐	☐	The item voted on related to a measurable goal.
☐	☐	All ideas were considered and modified as appropriate.
☐	☐	More than one solution was explored before a decision was made.
☐	☐	Everyone had an opportunity to raise questions, give opinions, express agreement/disagreement.
☐	☐	Members with disagreeing opinions were given time to express their concerns, hesitations, and dissenting thoughts.
☐	☐	If consensus agreement was used, all team members were supportive of the decision.

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Effective Meetings Checklist

Use this checklist to evaluate the effectiveness of your meetings.

Yes	No	
☐	☐	An agenda was prepared and distributed before the meeting.
☐	☐	Members arrived on time for the meeting and stayed until the meeting's closure.
☐	☐	The meeting started and ended on time.
☐	☐	The facilitator was prepared and managed the team's processes.
☐	☐	The team focused on the topics under discussion.
☐	☐	The team's work was clearly defined, had purpose, and related to overall goals.
☐	☐	Team members' discussion focused on ideas and their implementation rather than logistics, housekeeping details, and other minutia.
☐	☐	The members adhered to the team's norms.
☐	☐	The members came to the meeting with work completed that they agreed to do and were willing to accept work assignments.
☐	☐	Action plans were developed to follow through on team's decisions (e.g., Who will do the work? What will be done? When?) Timeline was identified.
☐	☐	Evaluation feedback was provided by the members at the close of the meeting.
☐	☐	Individuals with specific responsibilities (e.g., timekeeper, facilitator, recorder, process observer) added to the effectiveness of the team.

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Meeting Roadmap

[Team Name-Date]

What	Results	How	Time
Agenda Items	Expected result during this meeting related to this item	Process (e.g., discussion, presentation, observation, resource person, question and answer, reporting)	Time allocated to this item

What	Results	How	Time
<i>Example</i> 1. Get organized	Agreement on agenda	Discussion	5 minutes
2.			
3.			
4.			
Feedback	+ / Δ	Go around	5 minutes

+ = strengths: what was good

Δ = what should be changed for next time

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Sample Meeting Ground Rules

- Respect others; be on time; listen with interest.
- Interact with others.
- Participate in discussions.
- Be willing to compromise.
- Keep the best interest of the students in mind.
- Treat everyone in a dignified manner.
- Keep side conversations to a minimum.
- Support decisions made by consensus.
- Be honest and open to the ideas of others.
- Make a contribution; everyone is responsible for team success.
- Learn from the past, let go of it, and move forward.
- Focus on issues and content, not personalities and people.
- Be creative when appropriate and fact/logic-driven when needed.
- Follow through on agreements and action items.
- Encourage the expression of different points of view.
- Ask questions for clarification when you do not understand.
- Review the effectiveness of each meeting during the meeting.
- Check for consensus before finalizing decisions.

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Minutes of Meeting Sample Format

Name of Team

Date /Location of Meeting

Facilitator:

Recorder:

Timekeeper:

Process observer:

Members present:

Members absent:

Agenda item:

Discussion:

Action: Yes No

What?

By whom?

When?

Announcements:

Next Meeting Date:

Assigned Roles for Next Meeting:

Facilitator:

Recorder:

Timekeeper:

Process observer:



Communicating with Parents

Purpose

The research is clear on the value of parent involvement and partnerships with schools. Parent involvement is especially important when attempting to raise rigor and relevance and improve relationships. Involving parents, particularly those of high school students, is not an easy task. Yet, a plethora of studies has found that parent involvement is a key factor in supporting and promoting student academic success. If schools truly want parents involved, they will find that parents respond best to “hands-on” leaders who are actively involved in the lives of students.

The Rigor/Relevance Framework provides a common denominator for educators to think about and discuss levels of instruction. The Framework is also an effective tool for communicating with noneducators, especially parents. The Framework can enhance efforts to make parents more active partners in their children’s education.

Procedure

Following are various strategies to highlight rigor, relevance, and relationships while communicating with parents:

- As part of parents’ night, spend a few minutes explaining the Rigor/Relevance Framework (see Framework at the end of this activity) or, better yet, have the principal explain it as a schoolwide initiative.
- Instead of listing topics to be covered during the year or showing a content outline in various subjects, give parents a list of student objectives and student work, with the work labeled as to its quadrant on the Rigor/ Relevance Framework. This will help parents understand what their children will be doing, which work is more challenging, and which is application.
- When planning activities such as field trips and class projects, mention the Rigor/Relevance Framework level of the activity.

Adapted from
Reinventing 9th Grade
— *Academics Through*
Personalization,
published by the
International Center
for Leadership in
Education

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This will remind parents that all activities have a connection to learning objectives and that special events serve to extend student learning into the application and assimilation quadrants.

- Provide parents with suggested reading and community and online activities that they can do with their children to extend learning into other quadrants. For example, you might suggest ways they can review math facts while walking through a store. Explain to parents that they are not teaching math (which they might think is your job) but rather showing their children ways to apply their knowledge.
- Explain the Relationship Framework to parents. Brainstorm the behaviors and techniques that they use and teachers should use to move up the relationship scale. Discuss aspects of their children's behavior that act as positive or negative influences on their peers in building relationships.
- Ask for specific feedback from parents when they feel that the school is not moving toward higher levels of rigor, relevance, and relationships.
- Select a developmental skill area, such as multiplication, where students might be in Quadrant A at their current level. Give examples of how their skills will be extended during the year into one or more of the other quadrants.

Tips for School Leaders

- Get to know parents on a first-name basis and encourage them to address you by your first name.

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- Sacrifice the administrative business suit occasionally for more informal dress if it is consistent with the parents you serve.
- Work hard to demonstrate to parents that they are equal to you as human beings; you just have different roles.
- Liberal use of humor breaks down barriers. Accept good-natured teasing from parents and enjoy a good laugh together.
- Demonstrate active listening. Seek first to understand, then to be understood.
- Be aware of your nonverbal behavior and realize that this is stronger communication than the actual words you speak.
- Practice truth-telling with parents. Be candid about the school's challenges and adopt this philosophy: "In this school, we tell the truth."
- Our problems are opportunities. What makes us different is that by recognizing these "probletunities" we have the chance to improve conditions for our children.
- If you practice authenticity with parents, you will be able to anticipate and prepare for the types of questions and concerns that parents will present.
- One of the most important personal attributes for any school leader is visibility. When parents perceive that you are everywhere—at sporting events, concerts, performances—they make a judgment that this visibility means you care about their children. Yes, this type of visibility takes a great deal of time, but the dividends pay capital gains.

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- When parents sense you care, they will open up and ask questions. In addition, the authentic leader is available to work with parents on a one-to-one basis.
- In engaging parents in partnerships, the focus should always be on the children and never on the attributes or behaviors of the parents.
- Experience has taught many successful administrators that when parents trust you and realize you care about their children, their behavior changes unobtrusively.
- Recognize that in order to develop trust among parents, you must exhibit trustworthiness. Always be true to your word.
- Always remember that you and your staff work for the parents; they pay the taxes and elect the school board members who employ you.

Ways to communicate with parents include:

- through daily updates from students
- person-to-person at school events and community gatherings
- incentives to students to bring their parents to school programs
- through the media, including cable television and radio
- in churches and other community organizations
- electronically via e-mail and school Web pages
- through classroom parent networks
- on the telephone
- through “key communicators” (trusted community leaders) who are encouraged to communicate with school leaders about issues or concerns that come to their attention
- through formal parent leadership organizations, such as PTA,

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- parent councils, and parent advisory organizations
- via newsletters, both all-school and one specifically intended for groups of parents
- in newspaper articles, pictures, and letters to the editor

Invite parents to examine a school's practices and policies. Sometimes called the five Ps of invitational education — People, Programs, Places, Policies, and Processes — many successful schools conduct an audit related to them. How do we answer the telephone? How are parents greeted when they visit our school? Are our policies user-friendly and easily understood? What is the appearance of the outside of our school? Are our classrooms inviting places in which students truly want to learn? Is the school clean, are washrooms safe, and is graffiti removed immediately? In general, do we have a philosophy that our school should be the most inviting place in town?

Strategies for Reaching the Hardest-to-Involve Parents

Inviting

- In person
- Note home
- By telephone
- School newsletter
- Telephone tree
- Doorknob hanger
- Student invitation
- Personal letter from the principal/teacher

Building Trust

- Talk with parents outside of school.
- Find common ground, such as the weather, children, sports, and so forth. Share personal stories before discussing school.
- Offer assistance: trade coupons, share information about the community.

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Taken from
*Reaching the
Hardest-to-
Involve Parents*,
published by
the International
Center for
Leadership in
Education.

Time
Varies

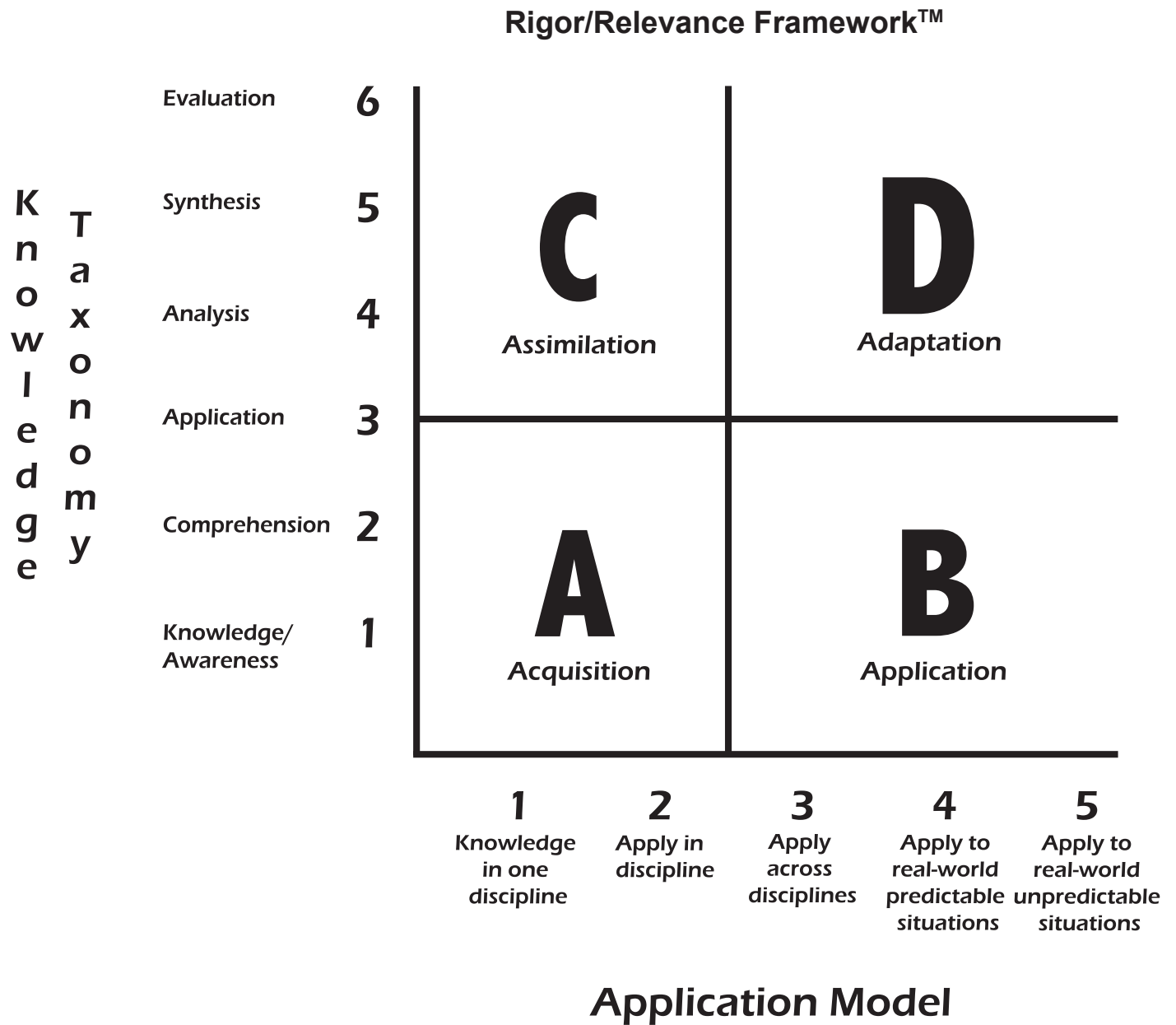
- Start a “welcome wagon” activity.
- Make positive telephone calls.

Removing Barriers

- Ask the PTA/PTO to start a “get a ride” service to school events.
- Use school buses or taxis to pick up families.
- Have translators available for non-English speakers and the deaf.
- Schedule meetings at several different times and locations.
- Feed them, and they will come!
- Offer on-site daycare at school functions.
- Provide classes for staff about how to work with parents.
- Give parents information about the school, rules, and policies.

Building Skills

- Provide opportunities for meaningful involvement — beyond bake sales.
- Offer information on where parents can take adult education classes.
- Begin involving parents from where they are and scaffold them to higher levels of involvement.
- Provide training to parents and staff on effective strategies for working in teams.
- Provide information to parents through workshops offered at convenient times for them.





Laser Talk

Purpose

Learning how to speak powerfully about our issues is one of the most important tools for the change leader. Educators can find dozens of opportunities to engage stakeholders in understanding and supporting a particular change. A laser talk is a short, to-the-point conversation to make a point and win support in a minute or two.

This format was created by RESULTS, an organization devoted to eliminating world hunger, to enable its volunteers to create these powerful, compelling laser talks that are the backbone of their work. Laser talks can be used during chance encounters with policy makers at any level, during phone calls with legislators, and in meetings with newspaper editorial boards.

RESULTS created a simple acronym, EPIC, to help people remember the basics of creating a laser talk. The letters in EPIC stand for Engage, state the Problem, Inform about the solution, and give the Call to action.

Procedure

1. **E = Engage the Audience.** Get your listeners' attention with a dramatic fact or short statement. Keep this opening statement to one sentence if possible. For instance, you could say: "I know you share my concern about improving high school graduation rate."
2. **P= State the Problem.** Present causes of the problem you introduced in the first section. How widespread or serious is the problem? "We lose too many students who never make it across the stage and are ill-prepared for employment, supporting a family, or contributing to the community."
3. **I = Inform.** Inform the listener about a solution to the problem just presented. "We are creating career academies in our

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high school through which we can better engage students by teaching some technical skills but also teaching core academics in the context of real-world applications."

4. **C = Call to Action.** Once you've engaged your listeners, presented the problem, and told them about a solution, be specific about what you want them to do. This enables you to follow up to learn if they've taken this action. Present this action in the form of a yes or no question. "Will you support our career academies by participating in an advisor group to expand the opportunity for students to tackle real-world learning projects in the community?"

Delivering a Laser Talk

Any good musician or actor would never go on stage without rehearsing first, and it is no different with public speaking.

It is important to speak to the other person instead of reading the information word for word. Refer to notes at first. Strive to keep the talk short — no more than two minutes. As you speak, you will discover where you need more practice or where you may want to change a part of it. These talks will develop and change as you learn new information over time, so be flexible and stay alert for interesting facts to update your talks.

Tips for delivering a laser talk:

- Practice your laser talk several times before practicing in front of another person.
- Memorize as many of the details as possible.
- Choose a member in your group with whom you feel safe practicing as your partner.
- Identify your audience — for example, the district superintendent or a business leader.
- Deliver your talk without stopping, even if you have a few

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stumbles along the way. The more you practice, the better you will get.

- Once finished, critique yourself. Pick two things that you liked about the talk and one thing you want to improve.
- Listen with an open mind and ear for learning how to make your talk better when your partner gives you feedback on your delivery.

Tips for listening to a laser talk:

- Ask the speaker to identify the target of this laser talk.
- Listen intently to the talk, trying to pick out different sections of the EPIC format.
- Did the speaker engage you up front?
- Did the speaker describe the problem and its solutions?
- Were you inspired by a clear call to action?
- Ask the speaker to critique his or her own talk.
- Tell the speaker two things that you really liked about the talk and one thing that you think he or she could improve upon.

Source: Used with permission of RESULTS (www.results.org).



This and That

Purpose

This activity engages groups to think about the constant work needed to implement changes. Participants focus on improving the characteristics related to a new skill or concept learned and reducing the behaviors or characteristics of the old paradigm. This works well as a follow-up activity after groups have had initial professional development and some experience implementing a change.

Preparation

Prepare a visual with the question or statement about change on which you want the group to work. The question/statement should reflect the objectives of a staff development activity. For example, if teachers have participated in a workshop on performance assessment, a follow-up might be: "The use of performance assessment is not an instant transformation of all student assessment but rather a gradual, continual process that involves using more of THIS and less of THAT. What are the examples of THIS and THAT?" Participants can then respond by summarizing in the THIS column the new assessment practices they have learned and wish to use and place in the THAT column the "old" assessment practices they wish to reduce or eliminate (see form provided for an example). This can be done as an individual reflection. It can also be done in grade level or department teams, with the goal being to reach consensus. Organize a large group into small groups of 6 to 8 people.

Materials

Chart paper or another means for teams to record suggestions

Procedure

Time
15-20 minutes

1. Display the visual with the question or statement you want the group to address.
2. Allow the group time to think about the question or statement.

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3. Explain that “THIS” is the positive characteristic needed for full implementation and “THAT” is the old behavior the organization is moving away from.
4. Ask each person to work independently to brainstorm characteristics for “this” and “that” (4-5 minutes)
5. Divide participants into small groups.
6. Allow time for group members to discuss individual ideas.
7. Have each small group report on the characteristics they identified. Discuss those that are most important and may require additional follow-up development activities.
8. Post the best ideas from the groups to be used as future reference.

This and That

Rigor and Relevant Learning Is the Goal for My Students

Making a change requires a vision of what is possible. Consistent steps over time work toward that vision. For progress to continue, you need to do some new things and stop doing some things you currently do.

I need to do a little more of THIS...	I need to do a little less of THAT...
My education team needs to do a little more of THIS...	My education team needs to do a little less of THAT...

Plus/Delta Feedback Form

+	Δ

Personal Growth Plan

The following reflective questions will guide you through the key aspects of developing a personal professional development plan.

Student Achievement

Goals ☐ What will students achieve differently as a result of your professional development?

Documentation ☐ What sources of data will you use to measure student achievement goals?

☐ Student Performance Test ☐ Student Portfolio ☐ State Test ☐ Local Test ☐ AP Test ☐ Student Projects ☐ Student Interview ☐ Job/College Placement ☐ Other _____

Personal Needs Assessment

Source ☐ What sources of information will you use to identify needs to be addressed in this plan?

☐ Personal Observation ☐ Student Performance ☐ Student Achievement Data ☐ Student Feedback ☐ Administrator Observation ☐ Peer Observation ☐ Self-reflection ☐ New Responsibility ☐ Other _____

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Type ☐ On what type of knowledge or skill will this plan focus?

☐ Classroom Management ☐ Content Knowledge ☐ Instructional Strategies

☐ Development of Assessments ☐ More Rigor/Relevance

☐ Use of Technology ☐ School Safety

☐ Analyzing Student Data ☐ Standards ☐ Character Education

☐ School to Career ☐ Other _____

Description ☐ What aspects of teaching and learning do you wish to improve?

Professional Development Goals

Goals ☐ What are your goals for professional development? Be specific. Include timeline.

Professional Development Activities

Methods ☐ Which methods will you use to achieve professional development?

☐ Workshop ☐ University Course ☐ Distance Learning ☐ Self Study

☐ Study Group ☐ Experimentation

☐ Action Research ☐ Partnership ☐ Immersion ☐ Coaching/Mentoring

☐ Other _____

Activities ☐ What professional development activities will you complete? Include timeline.

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To Be Completed after Professional Development

Professional Development Reflection

Activities — What did you personally accomplish in your professional development?

Evaluation

What are the positive impacts of this professional development?

What would you do differently?

Follow-up — What changes will you make in instruction? What are the expected changes in student learning?

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Examples of Personal Professional Development Strategies

Self-Directed Options

- Training video
- Visiting another school/workplace
- Interviewing colleagues about their work style and practices
- Reflective writing
- Computer training package on CD-ROM
- Piloting a program
- Professional reading
- Learning a new skill from a colleague
- Observing the work of a colleague
- Applying for and holding a new position

Collaborative Options

- Establishing a buddy relationship
- Teaching a skill to a colleague
- Identifying and using the expertise of a colleague
- Giving or seeking feedback
- Working in a team developing programs
- Action research project
- Team teaching
- Teacher exchange
- Informal discussion with colleagues

Training Options

- Attending a short course/training program
- Seminar program
- Giving a presentation to colleagues on an aspect of your work
- Mentoring or shadowing program
- Graduate courses
- Participation in a formal network



Daily Professional Learning

Purpose

A frequent point of debate within professional learning is whether it should focus on generic strategies or be driven by content. The research shows that each of these approaches can be effective in increasing student achievement. In practice, both aspects must be addressed in professional learning.

It is essential for professional learning to be frequent, ongoing, collaborative, and directly related to the real work of teaching and learning. To be effective, professional development must provide teachers with a way to apply what they learn directly to their practice. Research shows that professional development leads to better instruction and improved student learning when it connects to the curriculum materials that teachers use, the district and state academic standards that guide their work, and the assessment and accountability measures that evaluate their success.

Collective participation tends to create more active learning. This involves professional learning designed for groups of teachers from the same school, department, or grade level. Examples of collective participation include observing and being observed while teaching, planning for classroom use of what was learned, reviewing student work, giving presentations, leading discussions, and producing written work.

What matters most is what teachers learn. Professional learning should improve teachers' knowledge of the subject matter, as well as enhance their understanding of student thinking in that subject matter. Aligning substantive training with the curriculum and teachers' actual work experiences also is vital. The time teachers spend in professional learning makes a difference, but only when the activities focus on high-quality, subject-related content. Opportunities for staff to work collaboratively to better understand student learning, curriculum materials and instruction, and subject matter content can boost the performance of both teachers and students.

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Five Keys to Frequent and Meaningful Professional Learning

1. **Expectations.** Set an expectation for continuous collaborative learning.
2. **Context.** Make sure that professional learning focuses on the subject matter teachers will be teaching.
3. **Real work.** Align teachers' learning opportunities with their real work experiences, using actual curriculum materials and assessments.
4. **Opportunity.** Provide adequate time and resources for professional learning and ensure that the extended opportunities to learn emphasize observing and analyzing students' understanding of the subject matter.
5. **Measure results.** Regularly evaluate the impact of professional learning on teachers' practices and student learning.

Preparation

Make copies of the Climate for Daily Professional Learning Checklist and Ideas for Daily Professional Learning.

Procedure

Time
45-60 minutes

1. Create opportunities for teachers to talk about the climate for daily professional learning.
2. Distribute the checklist for teachers to reflect on current practice.
3. Discuss the items that teachers feel are strengths and weaknesses.
4. Have staff review the Ideas for Daily Professional Learning.
5. Develop an action plan to increase the climate for professional learning and expand daily professional learning opportunities.

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Climate for Daily Professional Learning Checklist

	Definitely	Partially	No
1. Have staff worked together to articulate a shared education vision focused on learning?	☐	☐	☐
2. Do leaders protect the vision and make it visible to others?	☐	☐	☐
3. Are learning goals clear, understood, and accepted?	☐	☐	☐
4. Do we take collective responsibility for school practices and outcomes?	☐	☐	☐
5. Do leaders in our school emphasize power through people rather than power over people?	☐	☐	☐
6. Do school leaders facilitate, guide, and encourage the adoption of practices that advance student performance and learning relationships?	☐	☐	☐
7. Do leaders communicate their passion for learning by challenging ineffective practices?	☐	☐	☐
8. Do leaders create a culture that supports risk-taking and encourages innovation?	☐	☐	☐
9. Are discussion and inquiry common and accepted practices in our school?	☐	☐	☐
10. Do we share information and make decisions together?	☐	☐	☐
11. Are we open to multiple approaches and solutions rather than reliance on single answers and past practices?	☐	☐	☐
12. Do leaders accept conflict as “good” and use it as a stimulus for change or is it “bad” and something simply to be controlled?	☐	☐	☐
13. Do we engage students as active learners and co-constructors of knowledge?	☐	☐	☐
14. Are there time and support for professional learning that improve curriculum, instruction, and student learning?	☐	☐	☐
15. Do leaders model lifelong learning for others by sharing new ideas, successes, and failures?	☐	☐	☐
16. Do teachers have considerable autonomy and discretion to plan curriculum and organize instruction within an overall framework?	☐	☐	☐
17. Do we use teams to plan and implement school improvement?	☐	☐	☐
18. Are there opportunities for dialogue and planning across teams, grades, and subjects?	☐	☐	☐
19. Is communication in our school open and fluid, or is it regulated by traditional chains of command?	☐	☐	☐
20. Do we create small, “communal” arrangements that personalize learning and maximize student-teacher and student-student interaction?	☐	☐	☐

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Ideas for Daily Professional Learning

Here are 50 ideas for professional learning that will engage staff in moving toward a goal of daily professional learning:

1. Conduct action research projects
2. Have regular meetings of teams to discuss lessons
3. Utilize in-house trainers
4. Plan lessons with teams of teaching colleagues
5. Examine student achievement data
6. Make classroom observations
7. Publish a Web site of shared teaching ideas by department or grade level
8. Set up an Internet blog on teaching and learning
9. Lead a book study
10. Visit a model school
11. Link tips of the day on the Internet to school Web site
12. Survey parents
13. Have teachers volunteer to write state assessments
14. Set up a study or support group that meets weekly
15. Review education software/Web sites
16. Establish demonstration classrooms where peers can observe model strategies
17. Do a classroom walk-through
18. Have teachers share Internet research on strategies monthly
19. Lead a school wide committee or project
20. Develop displays or bulletin boards
21. Have teachers shadow students
22. Team teach a lesson
23. Coach a colleague
24. Operate a mentor program
25. Have teachers take an online course as a team or department
26. Encourage teachers to join a professional network
27. Set up peer review of lessons and student work
28. Encourage staff to write an article about their work
29. Share recent reading from journals, periodicals, books, and so forth
30. Set up regular meetings of critical friends
31. Set up student focus groups
32. Set up a lending library of professional resources
33. Do a self-assessment
34. Design an interdisciplinary lesson
35. Shadow another teacher or professional in the field
36. Have teachers keep a reflective log or journal
37. Analyze and publish the expectations of statewide assessments
38. Invite guest subject experts
39. View educational videos
40. Have teachers maintain a professional portfolio
41. Study state content standards
42. Have staff observe other teachers teaching
43. Listen to video/audio recordings
44. Participate in a videoconference or conference calls with experts
45. Develop curriculum
46. Work on school improvement planning
47. Examine new technological resources to supplement lessons
48. Get observed and receive feedback from another teacher or principal
49. Participate in a lesson study
50. Work on a strategic planning team



Peer Teaching Observation

Purpose

No matter what the format of a peer review, the objective is always the same — to help teachers improve instruction. For every type of review, it is important to have a clearly defined process that outlines the roles and responsibilities of the reviewer(s) and the teacher whose practice/work is being reviewed. Equally important is a set of criteria for the review. This guides the teacher's work and provides the reviewer with a focus for commenting on that work.

Procedure

Peer observations in education involve using one's peers to examine aspects of teaching and learning. It is an opportunity for staff to reflect on strengths and weaknesses and to work together for improvement. The overall goal is to establish a culture of self-study that stimulates continuous inquiry, reflection, information sharing, and improvement. Through a peer observation process, teachers can periodically examine and reflect on where they stand in relation to their goals for improving teaching and learning.

Time
2 hours

Education groups universally endorse the value of peer observations. However, it is difficult to find the time to do it. To make the peer observation truly valuable, the full process of conferencing is essential.

- discussions about teaching prior to delivery of instruction
- classroom observations
- discussions about teaching after delivery of instruction

Preparation

Having a peer in the classroom to judge performance can initially be threatening to many teachers. Both the teacher being observed and the reviewer will be more comfortable if there is a well-defined focus. Therefore, it is best to perform peer observations around a specific purpose rather than judging overall instruction. For example, the observation might focus on the effective use of group learning or the integration of technology.

A Peer Teaching Observation Form is provided.

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Peer Teaching Observation Form

Observer Name	Date
Teacher(s) Observed	Time
Class	Length
Number of Students	

Focus of Observations: Describe the aspect of instruction on which the peer group has agreed to focus for the peer observation.

Observations: Describe the strength and areas of improvement related to the focus of the observation.	
Strengths	Needs Improvement

Rigor and Relevance: Describe the degree to which students were challenged to think in complex ways and apply their learning.	Student Engagement: Describe the degree to which students were motivated, interested, and committed to learning activities.

Teaching Behaviors Appropriate for Peer Teaching Observation

Here are some specific purposes that might be the focus of data gathering during a peer observation. Choose no more than two for each observation.

- examples of real-world applications
- patterns of calling on students
- balance of negative and positive feedback
- clarity of directions
- using open-ended questions
- body language that supports building learning relationships
- wait time for student response to teacher questions
- balance of teacher and student talk
- correlation of objectives and activities
- effective use of cooperative learning groups
- strategies for helping individual students
- recognizing different learning styles
- strategies for encouraging students who choose not to participate
- reducing interruptions
- “kid watching” to give feedback on certain students’ behavior
- collecting data for action research projects
- coaching skills



Asking the Right Questions

Purpose

Supervision of learning is about follow-up and support. An instructional leader needs to not only set the vision and develop staff around teaching priorities, but he or she also needs to follow up. This supervision of learning takes many forms — formal teacher observations, classroom walkthroughs, conversations with students, and individual conversations with teachers. In any of these supervisory situations, good questions are essential.

Procedure

As you engage in conversations, both formal and informal, prepare yourself with a great set of questions to learn about what is happening in teaching and learning in each classroom and also to encourage teacher reflection. Asking the Right Questions to Improve Learning, which follows, is a great place to begin.

Asking the Right Questions to Improve Learning

Principals who perceive themselves as instructional leaders seem to know all the right things to do. They venture out of their offices to interact with staff, students, and parents; they actively observe teaching; they listen to staff and parent feedback; and they “get in touch” with the needs of students. All of these “doing” activities make principals more knowledgeable about the teaching and learning that is taking place in their schools. But does all this knowledge actually promote change? The answer depends on the communication skills of the leader.

The changes needed to improve learning must ultimately come from teachers. If principals are to use their extensive knowledge to influence the quality of learning, they must learn to communicate in ways that influence teaching and learning. Often this means asking the right questions.

Questions are the hidden key to good communication. Questions engage people in active conversations, they stimulate thought, and they control the direction of communication. Good questioning techniques are vital to a principal’s efforts to effectively communicate what they know about teaching and learning in their school. This is particularly so in the case of classroom observations, one of the most common responsibilities of instructional leaders.

Principals frequently communicate what they have learned from classroom observations through traditional tools such as the policy memo, faculty “sermon,” or an individual coaching session. Like most educators, principals typically apply their own teaching experiences to their evaluation of classroom practices, and in so doing, they often attempt to influence others’ ideas about the right way to teach. Sometimes this works. Often it fails. It fails because of limited, misinterpreted observations or unconvincing arguments made to an unwilling listener. But it is precisely this ability to convince others that leads to changes in instruction, thus improving learning.

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Effective instructional leaders can encourage teachers or others to change practice through self-reflection. Good communication skills are instrumental in guiding and stimulating such reflection. A well-timed, thoughtful question can be the most effective way to stimulate a person's thinking about his or her own practices. The principal who is able to ask the right questions at the right times is well on the way to being not only an active observer, but also one who is able to thoughtfully influence change without resorting to mandates or forced practice. Change that is imposed is often opposed, but change that is nurtured is frequently embraced.

In order to use the appropriate questions at the right times, it is important to understand the different types of questions and the kinds of information that they elicit. Questions can be grouped into two major types:

1. **Close-ended** questions are requests for specific information, with a narrow range of response. These include such questions as "Is this the right road to Dover?" and "What is the square of 8?" Close-ended questions act as a precise probe for particular information and a prompt response.
2. **Open-ended** questions serve as stimulants for broad responses, encompassing a wide range of information. Often there are multiple appropriate responses to such a question, or there may be no obvious "answer" at all. Examples of open-ended questions are "What was the intended purpose of that lesson?" and "Why are visual aids important to learning?" This type of question requires deeper thought and reflection in its response.

Effective Use of Open-Ended Questions

In the context of evaluating teaching and learning practices, it is open-ended questions that possess the most potential for rich reflection. By using such questions, the educational leader can stimulate thoughtful conversations about current and innovative practices and possibly influence change.

There are several types of open-ended questions that principals can use to stimulate teacher reflection. It is important when attempting to facilitate thoughtful reflection to be sure that the questions cannot be answered with a one-word answer or simple response. Ambiguity is fine, but the questions should be precise enough to be understandable and should relate clearly to teaching and learning.

Following are five general types of open-ended questions which can be used as guidelines when thinking of good questions to enhance reflection.

1. *Explanation questions: How do you ...?* Explanation questions encourage teachers to think about their teaching, while compelling them to analyze the learning process and the ways in which their students learn. By describing the learning process in their own terms, teachers must confront their own beliefs about the practice of teaching and the essence of learning.

Examples of explanation questions:

- How do you develop the assessments you use in your classroom?
- How do you get all students to participate?
- How do you explain the purpose of this lesson?

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- How do you get students to ask more questions?
- How do you help students to develop writing and speaking skills?

2. *Discovery questions: What is ...?* Discovery questions require teachers to devise solutions and examine learning from different perspectives. These questions should present interesting problems that do not have simple or obvious explanations. At the same time, they should challenge teachers to make connections with previous or new information.

Examples of discovery questions:

- What is the connection between this lesson and the state standards?
 - What is an aspect of your students' work that you are most proud of?
 - What is your most difficult problem in teaching?
 - What is something that other staff or I might help you with?
 - What is the most difficult part of your curriculum to assess?
3. *Causation questions: Why ...?* Causation questions invite teachers to think about the possible causes of certain occurrences and encourage them to think about the practices that contribute to high achievement. This type of question is ideal for making direct connections between teacher behavior and student learning, as well as for reinforcing good practices and identifying problems.

Examples of causation questions:

- Why do your students maintain a high interest level in your classroom?
- Why do your students work well by themselves?
- Why do your students work well in groups?

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- Why do students show pride in their work?
- Why do you think some students are not paying attention?

4. *Hypothetical questions: What if ...?* Hypothetical questions confront teachers with new situations and require them to look at instruction in different ways. In order to answer such a question, the teacher is obligated to think beyond the components of a specific lesson or the events of a particular class and to draw upon and make connections to other experiences.

Examples of hypothetical questions:

- What if a student arrives late to class?
- What if the demonstration did not work as you planned?
- What if you reversed the numbers in this math equation?
- What if you gave each student a different project?
- What if you had a longer instructional period?

5. *Creative questions: How would you ... ?* Creative questions challenge teachers to devise new instructional strategies. Drawing from their past experiences, teachers apply what they know about a given problem to design a more effective or appropriate instructional technique.

Examples of creative questions:

- How would you assess students in a more authentic manner?
- How would you challenge students who are ready for more complex materials?
- How would you give individual attention to students who need more help?

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- How would you build connections to language arts skills into your lessons?
- How would you add more relevancy and real-world application to your instruction?

Tips and Techniques

Effective questioning depends not only upon the questions themselves, but also on the ways in which the questioner is able to set the tone in order to encourage thoughtful response. There are a few simple guidelines that will help questioners foster real reflection.

Using Wait Time

Wait time refers to the length of time between a question and the time it takes someone to respond. Deliberately waiting for five to ten seconds after a question is asked allows for deeper thought on the question. Often the questioner will wait only a brief moment before prompting a response or, worse, moving on to follow-up questions. This simultaneously puts pressure on a person to respond quickly, while relieving him or her of the responsibility of giving a thoughtful answer. Practice being more deliberate and consciously waiting once you have delivered a provoking, open-ended question intended to stimulate reflection.

Listening

Questioning is only one part of the communication process. For this to be an effective process, it is crucial that communication flows in both directions. Show respect and interest by maintaining eye contact, refraining from interrupting, and paraphrasing the

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response to ensure that you have understood what was being said. If you become frustrated by a response which seems long or unfocused, do not interrupt the person, but before asking the next question, encourage him to be more concise in his or her response, and to think through his or her response more thoroughly before answering.

Framing the Question

A good question should generally be brief and to the point. This makes it clear what kind of information the questioner is soliciting. However, it is often beneficial to frame a question with one or two brief statements on the topic, contributing to a more natural conversation. A questioning session which feels like an inquisition will make a person nervous and defensive, rather than thoughtful and open. By making a couple of positive statements before posing the question, the questioner is able to create real dialogue without the sense of an inquest. For example, you might preface a question on the objectives of a particular lesson by stating a few of the things you observed students doing in the classroom. While it is a good idea to prepare for a reflective session by listing questions in advance, do not stick rigidly to a script. Remember to maintain a natural conversation in which you pose questions that stimulate thought and reflection.

Monitoring the Difficulty of Questions

It is important to think about the level of difficulty in the questions being asked. Questions which are either too simple or too complex can destroy the opportunity for reflection. Try to know as much as possible about the person you are interviewing, and be conscientious in monitoring body language to be sure you are finding the appropriate level of difficulty.

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Suggested Questions

The following questions can be useful in making the most of classroom observations. Principals may also want to encourage teachers, in brief interviews, to use these questions to reflect upon the learning process and their own practice.

- How do you get students more engaged, more thoughtful, and more expressive?
- What is it that you want students to know and be able to do?
- What is the work that students are expected to do?
- What is the evidence you rely on to indicate the degree of student engagement and understanding?
- Why are students meeting (or not meeting) your expectations for achievement?
- How would you use more time or resources to improve learning?

Effective Observation

Observation should not be limited to the classroom—effective observation involves every member of the school community in every school setting. There are a number of ways in which a principal can expand the range of observations taking place.

- *Follow a student.* Principals can learn a lot by following one student for an entire day, followed by an interview about what happened during that day. In addition to observing the student, the principal will have the opportunity to observe six or seven teachers.
- *Walk around.* The concept of being involved in the life of the school is good at any time. Visit a few classrooms during the day, and do not forget art, technology, physical education, library, and family and consumer science classes.

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- *Observe other events.* There are many other ways and times to make observation reports. Principals may want to write about the special efforts being made during a play rehearsal, band concert, math convention, career day, or parent night. Use any meaningful situation to observe, record, reinforce, and give feedback.

In post-observation conversations with teachers, it is vital that the atmosphere remain positive. The lines of communication should always be kept open. Principals should encourage teachers to invite them into the classroom for interesting lessons or special events. When they receive such invitations, principals need to make it a point to be there.

Observation can be one of the more pleasant aspects of the principal's role. It allows him or her to spend more time with students—a priority in any principals' work—and to have positive, constructive contact with teachers. Regular observation can also stimulate improved classroom activity and instruction.

Where to Begin

Effective use of thought-provoking open-ended questions does not need to be a dramatic redesign of an instructional leader's observation and conversation techniques. Begin simply. The next time you sit down for a conversation with a teacher, do the following. On your notepad, write the words "Student Work" to remind you that the conversation should be less about what the adults in your school are or are not doing, but how teachers, staff, and administration can work together to create the ideal conditions necessary for students to learn and achieve. Next, write the five open-ended question stems in the left margin of your notepad: "How do you...?" "What is...?" "Why...?" "What if...?" "How would you...?" Use these stems to help you form provocative questions about teaching and learning, and then let the conversation evolve naturally.

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Good Reflective Questions

What do you want students to learn?

What are the levels of rigor and relevance?

How could you make this more rigorous?

How could you make this more relevant?

How do you know students are learning?

Are you meeting the needs of all students?

What data are you using to determine you are meeting the standards?

What can I do as an instructional leader to support your efforts?

What was the most successful part of the learning experience and why?

If you teach this lesson again, how would you change it?

How do you know learning has occurred?

What strategies do you use to address individual learning styles?



Content



Define Rigor and Relevance

Purpose

This group discussion helps to engage teachers in understanding the meaning of the terms *rigor* and *relevance*. Embracing these terms as goals is easy. What is harder is for teachers to translate the terms into instructional practices that they can follow consistently.

Having a structured discussion on the meaning of these terms helps each teacher to build deeper personal understanding of rigor and relevance. It also exposes any misconceptions that teachers might have. By conducting this discussion prior to introducing the Rigor/Relevance Framework, teachers are less likely to see the framework as externally imposed but rather as a way to define systematically the concepts of rigor and relevance in line with what they already believe about them. This discussion of definitions will set the background raise the level of interest when introducing the Rigor/Relevance Framework.

Procedure

Time

30-40 minutes

1. Divide teachers into small groups of 5-6 people.
2. Inform the groups that they are going to define "rigor" and "relevance" separately, first by working through the term "rigor" and summarizing the definition and then working through the term "relevance."
3. Ask each small group to spend five minutes brainstorming rigor. Use the question, "What does academic rigor mean in school?"
4. After the groups have completed the rigor brainstorming, have them report out using a go-around technique so that no group dominates the conversation. In a go-around, each group shares one idea. After all groups have reported out, let any group add other ideas.

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5. Display the ideas on a flip chart or other visual so everyone can see them. Summarize the phrases. In summarizing rigor, be careful to avoid using synonyms of “difficult” or “rigid.” While these are dictionary definitions of rigor, what is often referred to as rigor in a school is not necessarily difficult, and requiring arbitrary deadlines does not necessarily increase the rigor of student learning. Also, be sure to note that rigor is measured from the perspective of the quality of the student work rather than from the content or quality of the teaching.
6. As an optional activity, have a couple of people revise these ideas into a working definition of what rigor means.
7. Repeat the process with the definition of relevance. Use the question “What do we mean by relevant learning in school?”
8. After brainstorming and the go-around, summarize relevant. Again, look for the characteristics of the student work and not necessarily the instructional strategies used.

Purpose

Procedure

Using this rubric as a reflection instrument can enable teams to identify strengths and weakness and develop plans of action.

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High School _____

Rubrics for Components of School Excellence					
1. Embrace a Common Vision and Goals – Rigor, Relevance, and Relationships for All Students. Schools, like any organization that seeks to improve, must have a common vision shared by all. Everyone must be committed to shared goals to measure success, and staff must have the same perspective as to what it important in the organization.					
	Pervasive	Considerable	Partial	Initiated	Absent
1. References to high student expectations for rigor, relevance, and relationships appear in vision and mission statements of the school.					
2. The belief is reflected in student and teacher handbooks.					
3. The belief is evident among school personnel, with no apparent dissenters.					
4. The belief is evident in conversations with students.					
5. Students have a clear and ambitious picture of what they will do in the future.					
6. Students know and understand the meaning of high-quality work.					
7. The need for high student expectations for rigor, relevance, and relationships is communicated to parents and community in newsletters, reports, and school policies; at school events and parent conferences; and on the school's Web site.					
8. The school's emphasis on learning is reflected in the displays, posted materials, and awards within the building.					
9. The school is designed to promote sustained student relationships with adults.					
10. The schedule is designed to promote sustained student relationships with adults.					
11. Students have an adult advocate and a personal plan for progress.					
12. Staff are dedicated to helping all students meet state and local standards.					
13. Students perceive staff as caring and concerned with their education achievement.					
14. Conditions and personnel in the school are inviting and welcoming, which encourages and supports parental involvement.					
15. All staff members, including bus drivers, cafeteria workers, custodians, and office personnel, are seen as contributors to achieving the mission of the school.					
16. The culture of the school includes celebration of both student and faculty achievement.					
17. All students are regularly encouraged to do their best work and to "go the extra mile." Extra effort is encouraged and rewarded.					
18. The school has in place specific strategies for ensuring all staff have high expectations for each and every student.					

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2. Inform Decisions Through Data Systems. Whole-school/district reform is a continuous process guided by a well-developed data structure based on multiple measures of student learning. Highly successful schools/districts use quality data to make laser-like decisions about curriculum, instruction, and assessment.

	Pervasive	Considerable	Partial	Initiated	Absent
1. There are measurable goals tied to the school vision.					
2. The staff has identified a few important priorities that serve as a common focus throughout the school.					
3. There is a willingness to explore ways to use data to measure progress.					
4. The school collects data to determine the amount of high-rigor/high-relevance instruction.					
5. The school has data on student performance related to students' goals.					
6. Data is used to highlight gaps that exist between student performance and real-world expectations.					
7. The school examines data for all appropriate subgroups to measure success of all students.					
8. Student achievement data is used to plan staff development.					
9. Student achievement data is used to recognize teacher and staff performance.					
10. Assessment data is provided to parents and students in a form they understand and to teachers in a format that can be used to make informed instructional decisions.					
11. The school regularly reviews data to develop school improvement plans and to monitor progress.					
12. The school looks for trends in data over time.					
13. The school collects and uses follow-up data on student satisfaction and success beyond school.					

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14. The school uses multiple indicators, including student work, to analyze student performance, not just one set of test scores.					
15. The school prepares reports that celebrate student and faculty achievements and communicate school goals.					
16. Student literacy levels are measured continuously and this data is compared to literacy achievement goals.					
17. The school conducts satisfaction surveys with parents and community.					
18. The school conducts focus groups for parents and community members.					
19. The school tracks data on parent involvement and has specific goals to increase parent involvement and support.					
20. State tests are seen as the beginning line, not the finish line.					
21. School success is measured by indicators beyond the state test.					
22. The school has developed a report card that reports student learning results in areas of student engagement, stretch, and personal skill development.					

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3. Empower Leadership Teams to Take Action and Innovate. Schools that will be most successful in the 21st century are led by individuals who possess skills and attitudes to take action rather than defend the status quo. Leadership does not reside in a single position but reflects the attributes, skills, and attitudes of the many staff members who take action and improve through effective learning communities.

	Pervasive	Considerable	Partial	Initiated	Absent
1. The principal assumes, but shares, responsibility for all phases of school operations as well as relations within the school, with the school district, and with the community.					
2. School staff feel that leadership provides clear direction and adequate support in helping to achieve school goals.					
3. A strong collaborative relationship exists between the administration and the leadership of the teachers' union.					
4. Adults in the school share meaningful feedback and suggestions for improving their work.					
5. The adults believe they have a responsibility to help set the tone for student behavior and create an atmosphere of high expectations.					
6. Many teachers are involved in decisions that impact the entire school, not just their individual classrooms.					
7. The faculty and administration demonstrate effective teamwork and leadership.					
8. The administration uses leadership teams, advisory groups, and community representatives to gather information and share goals.					
9. Administration demonstrates that student achievement is a priority by their actions and use of resources to support it.					
10. Administration uses technology (media, newsletters, public service announcements) to communicate the mission of the school to students, faculty, and community.					
11. Current leaders are actively involved in recruiting and mentoring future leaders.					
12. Administrator evaluations are based on student achievement.					
13. Teacher evaluations are based on student achievement.					

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14. The school actively seeks and involves parents on advisory committees for the purpose of school improvement.					
15. Administrators and teachers are active in the community.					
16. Leaders actively participate with staff in ongoing professional development.					
17. Acquiring/developing a high-quality staff is considered the most important factor related to student achievement.					
18. The professional development program is aligned with the instructional improvement plan.					
19. Teachers and administrators have individual improvement plans.					
20. Faculty teamwork is a “way of life” in the school.					
21. Available resources are discussed to determine the appropriate uses to meet the goals and mission of the school.					

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4. Clarify Student Learning Expectations. Inconsistent state standards, tests, and community expectations create a wide-ranging and jumbled assortment of curricula, instructional practices, and classroom materials, as well as varying expectations for rigor within and across grade levels. When districts take steps to clarify what students are expected to learn, they meet with success in improving student achievement.

	Pervasive	Considerable	Partial	Initiated	Absent
1. A process is in place to design and update curriculum based on analyses of state standards, assessments, and local priorities.					
2. There is agreement among teachers about the academic skills and knowledge to be taught.					
3. Common rubrics have been designed and are used across disciplines in such areas as writing, research projects, demonstrations, problem solving, and decision making.					
4. There is evidence that all teachers, regardless of subject area, take responsibility for delivering high-priority academic skills and knowledge.					
5. Literacy development is addressed in all disciplines.					
6. Instruction is aligned with curriculum and state and local assessments.					
7. Curriculum topics are sequenced. There is a schoolwide delivery plan.					
8. Faculty work together to create learning experiences that are challenging, allowing students to think independently and extend their knowledge.					
9. Learning experiences relate to problems or situations connected to the world beyond school.					
10. Learning experiences allow students to become actively engaged in tasks that lead directly to learning objectives.					
11. Faculty share techniques/strategies that successfully differentiate learning for students functioning at different literacy levels.					
12. The process used by teachers to develop instructional plans is consistent across the school.					
13. Students and parents agree on academic expectations.					
14. The school has developed a consistent approach to ensuring that all students have full access to the general education curriculum.					
15. The curriculum focus is competence, not coverage.					
16. The school assessment program is based on district and state standards.					
17. The school uses data to align curriculum both vertically across grades and horizontally across subjects.					

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5. Adopt Effective Instructional Practices. More than high test scores, successful instructional practices include having a wide range of strategies and tools to meet the needs of diverse learners in all disciplines and grade levels. Success in achieving state standards results from not teaching in routine and proscriptive methods but from selecting successful instructional practices to meet the needs of all students.

	Pervasive	Considerable	Partial	Initiated	Absent
1. There is a strong focus on teaching the application of content knowledge to real-world situations through class and individual projects, hands-on activities, and various methods of communication.					
2. Faculty regularly review instructional practices and makes modifications to make them more relevant.					
3. Students understand the purpose of instruction and how skills and knowledge can be applied.					
4. A good portion of student work is analytical – research papers, projects, demonstrations, experiments, and extended writing.					
5. Faculty work together in interdisciplinary teams to create learning experiences linked to high-priority standards that focus on the application of knowledge in real-world settings.					
6. The school uses community resources to bring relevancy to the instructional programs.					
7. Students are typically asked to present their work to their peers.					
8. Faculty uses strategies to connect learning to students' experiences and previous learning.					
9. Students work collaboratively in groups.					
10. Assessment practices are rich and include a variety of performance measures, such as portfolios, projects, peer reviews, and presentations.					
11. Teachers regularly demonstrate how to apply learning and use real-world examples.					
12. Internships and/or community service projects are a major focus of the instructional program.					
13. Community representatives participate as advisors, mentors, and reactors to student work.					
14. Teachers employ innovative, active, and effective instructional practices.					
15. Teachers have time, opportunities, and incentives to reflect critically and analytically on what they are teaching, not teaching, and why.					

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16. The school has a process to share best practices of faculty throughout the school (study circles, peer reviews, etc.).					
17. All students, regardless of ability, have opportunities identified in the curriculum to engage in higher order thinking skills and problem-solving tasks.					
18. Students also take an active role in the professional learning community by sharing knowledge and teaching others.					
19. Teachers use grading practices that promote high levels of student engagement and achievement.					
20. Instruction is personalized through differentiation strategies, attention to student needs and progress, attention to learning styles, and respect for student diversity.					
21. Faculty receive reading levels of students and review the reading levels reflected in their textbooks.					
22. Instruction demonstrates that textbooks are used to support learning rather than as a "cookbook."					
23. Literacy is an important priority throughout the school.					
24. Pretesting and other data is used as a tool to individualize instruction.					

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6. Address Organizational Structures. Organizational structure should be determined by instructional needs. Only after a comprehensive review of instructional practices should schools begin to address issues of organization such as school schedules, use of time, unique learning opportunities, school calendars, and physical structure.					
	Pervasive	Considerable	Partial	Initiated	Absent
1. Teachers know their students very well (examples: teachers attend after school events, have lunch with students, make it a practice to call students' homes, and are involved with advisement/mentoring programs).					
2. Special programs and structures are in place to ensure the successful transition of students into and out of high school.					
3. Applied academic programs have been developed based on student needs and interests.					
4. It is common practice, supported by the school schedule and structure, to vary amounts of instructional time and resources to accommodate differing student needs to achieve proficiency.					
5. Surveys are used to learn about student interests.					
6. Students have choices and options regarding their learning.					
7. The school is organized around the needs of students.					
8. Media centers and study labs are readily available to all students.					
9. Technology is used effectively as a tool to differentiate instruction and as a resource for all students.					
10. Organized extracurricular organizations and athletics provide adequate opportunities for students to develop interests and abilities, in addition to academic achievement.					
11. School policy goes beyond "open door" to "open heart" in inviting parents and interested community members to play an active role in the education process.					
12. The school seeks ways to increase community participation in the life of the school (free admissions, coupons, senior discounts, volunteer opportunities, a nonprofit 501(c) (3) education foundation, etc.).					
13. Faculty and administrators have the belief that educating students is more effective when parents understand and buy into the principles upon which the school operates.					
14. The use of faculty time and resources reflects the school's emphasis on development of literacy skills and independent learners.					

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15. The school has taken steps to make the media center, athletic facilities, and other school facilities available to the community when possible.					
16. School's programs are supported by parent/community booster clubs.					
17. Any small learning communities are organized around student needs and given autonomy to meet those needs.					
18. Multiple pathways to achievement are provided to give students options that allow for variations in time for students to be successful.					
19. Any career academies are designed on sound practices including community partnerships, incorporation of academics, and preparation for all levels of continuing education and careers.					

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7. Monitor Progress/Improve Support Systems. Highly successful programs recognize the need to monitor student progress on a regular basis. Successful schools use formative assessments in an organized, deliberate, and ongoing fashion to monitor student progress. Further, they use this data immediately to adjust instructional practices and intervene to meet student needs.					
	Pervasive	Considerable	Partial	Initiated	Absent
1. Root causes of obstacles to student achievement have been identified and serve as topics for staff development.					
2. Professional development programs are routinely evaluated and modified accordingly.					
3. The school uses a variety of resources and strategies to help parents understand the standards, assessments, and academic achievement requirements for students.					
4. Teachers are encouraged to communicate regularly with parents in writing, by phone, and in person concerning student success and needs.					
5. No excuses are accepted for students not being successful. Unmet expectations are seen as a problem that can and must be corrected.					
6. Additional time, resources, and other interventions are available to students not meeting expectations.					
7. The school uses a variety of rubrics as often as applicable so that students know what quality work looks like.					
8. Student progress is monitored frequently with formal and informal assessments.					
9. Student progress reports are regularly shared with students and parents.					
10. Faculty members meet regularly to discuss the progress of individual students.					
11. Advisement/mentoring programs are available to all students and help identify students who are at risk of not meeting expectations.					

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12. Pretesting in classrooms is used often to ensure that students are consistently challenged but not overwhelmed.					
13. Academic intervention services are prescribed immediately when a student does not meet expectations rather than next year.					
14. The principal, other administrators, and/or teachers visit parents at home and/or through community agencies.					
15. A comprehensive plan sets the priority for use of funds for instructional improvement, teacher evaluation, and professional development.					
16. Counseling services are readily available to all students.					
17. A data-driven, consistent, schoolwide intervention system is in place for struggling learners.					
18. All students have access to content through resources, materials, supplemental information and support.					

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8. Refine the Process on an Ongoing Basis. High-performing schools realize that success is a continuing and ever-changing course of action. This step in the process, in fact, should reinvigorate the process and cause school leaders to look at new and emerging challenges and explore potential solutions and successful practices from around the country.					
	Pervasive	Considerable	Partial	Initiated	Absent
1. School leaders look at new and emerging challenges and explore potential solutions from around the country.					
2. School improvement is ongoing and driven by student needs.					
3. The school actively researches best practices on an ongoing basis.					
4. Staff is engaged regularly in discussions to understand and reflect on the need for continuous improvement.					
5. The school has a well-organized school improvement team that meets regularly throughout the year.					
6. Systems are in place to collect feedback on school programs from students, teachers, parents, and community members.					
7. Professional development is ongoing and an important part of the school's culture.					

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Summary

Component	Pervasive	Considerable	Partial	Initiated	Absent
1. Embrace a Common Vision and Goals – Rigor, Relevance, and Relationships for All Students. Schools, like any organization that seeks to improve, must have a common vision shared by all. Everyone must be committed to shared goals to measure success, and staff must have the same perspective as to what it is important in the organization.					
2. Inform Decisions through Data Systems. Whole-school/district reform is a continuous process guided by a well-developed data structure based on multiple measures of student learning. Highly successful schools/districts use quality data to make laser-like decisions about curriculum, instruction, and assessment.					
3. Empower Leadership Teams to Take Action and Innovate. Schools that will be most successful in the 21 st century are led by individuals who possess skills and attitudes to take action rather than defend the status quo. Leadership does not reside in a single position but reflects the attributes, skills, and attitudes of the many staff members who take action and improve through effective learning communities.					
4. Clarify Student Learning Expectations. Inconsistent state standards, tests, and community expectations create a wide-ranging and jumbled assortment of curricula, instructional practices, and classroom materials as well as varying expectations for rigor within and across grade levels. When districts take steps to clarify what students are expected to learn, they meet with success in improving student achievement.					

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5. Adopt Effective Instructional Practices. More than high test scores, successful instructional practices include having a wide range of strategies and tools to meet the needs of diverse learners in all disciplines and grade levels. Success in achieving state standards results from not teaching in routine and proscriptive methods but from selecting successful instructional practices to meet the needs of all students.					
6. Address Organizational Structures. Organizational structure should be determined by instructional needs. Only after a comprehensive review of instructional practices should schools begin to address the issues of organization such as school schedules, use of time, unique learning opportunities, school calendars, and physical structure.					
7. Monitor Progress/Improve Support Systems. Highly successful programs recognize the need to monitor student progress on a regular basis. Successful schools use formative assessments in an organized, deliberate, and ongoing fashion to monitor student progress. Further, they use this data immediately to adjust instructional practices and intervene to meet student needs.					
8. Refine Process on an Ongoing Basis. High-performing schools realize that success is a continuing and ever-changing course of action. This step in the process, in fact, should reinvigorate the process and cause school leaders to look at new and emerging challenges and explore potential solutions and successful practices from around the country.					

Purpose

A score on a test should not be the only measure of academic achievement and school success. To address the needs of 21st century learners and at the same time enhance students' ability to "pass the test," schools need to take a broader view of learning in deciding what makes someone "graduation-ready" and a lifelong learner.

The Learning Criteria is based on four dimensions that can help a school better define how well it is meeting the needs of all learners:

Stretch Learning is the demonstration of rigorous and relevant learning beyond minimum requirements, such as participation in higher-level courses.

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and accomplishment, and have relationships with adults, peers and parents who support learning.

Personal Skill Development consists of measures of personal, social, service, and leadership skills, as well as demonstrations of positive behaviors and attitudes.

While some schools have made the Learning Criteria a part of their school improvement planning process, a more common approach is to use it for such purposes as:

- redefining the mission of the school within a culture of high expectations
- establishing a comprehensive school accountability system with relevant measures beyond standardized test scores
- establishing goals and identifying responsibilities for all stakeholders in efforts to reinvent existing programs
- assessing the comprehensiveness of the state-mandated school improvement plan
- raising school performance in all four dimensions

Procedure

Putting the Learning Criteria to Use

The four dimensions of the Learning Criteria to Support 21st Century Learners are interrelated. This interconnectedness contributes to the benefit of the Learning Criteria's holistic approach. Moreover, looking at multiple aspects of school performance and student needs informs thinking and decision making about individual aspects.

A school district should identify data indicators in each of the four dimensions. To the extent possible, indicators should apply to the

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entire student population. To identify successes and maximize its usefulness, the data collected should be viewed from the following perspective

- **School Performance** – Express in measurable terms
- **Disaggregated** – Data for all subgroups
- **Sustained** – Begin to compile trend data to show progress
- **Benchmarked** – Compare to similar local schools, schools in the state, or schools in the nation.

Each of the indicators in the four dimensions of the Learning Criteria should be rated on a five-point scale: exemplary, very good, acceptable, approaching acceptable, and needs improvement. "Acceptable" is the midpoint and indicates when observations show that the school minimally meets acceptable levels of a specific characteristic. "Approaching acceptable" means just below acceptable, but the school is working hard to implement new initiatives and programs to meet the level. "Needs improvement" indicates that a specific characteristic is far below an acceptable level.

On the other end, school characteristics that exceed acceptable levels of a particular indicator would be rated "very good." "Exemplary" is reserved for schools with extremely high performance results on specific indicators. Schools that make the highest rating on a majority of the indicators typically serve as models to other schools.

Following are rubrics for the four dimensions.

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High School _____

Learning Criteria to Support 21 st Century Learners Rubric					
Core Academic Learning – Achievement in the core subjects of English language arts, math and science, and others identified by the school.					
	Exemplary	Very Good	Acceptable	Approaching Acceptable	Needs Improvement
Student performance in Core Learning is expressed in objective terms					
The school has met AYP requirements in core subjects for total students for several years					
There is no significant difference in student performance across subgroups					
School makes benchmarked comparisons for Core Learning with schools that are similar in focus, community, and structure					
Students are able to progress to the next level of school without the need to additional instruction in core subjects					
Core achievement data reflects increasing or sustained performance at high levels for several years					
Staff fully understand the indicators for Core Learning and can relate their work to achievement in the indicators					
All staff have access to and understanding of school performance data in Core Learning					
School has objective goals and timelines for core academic achievement					
Students with disabilities meet academic core requirements					

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Stretch Learning — Demonstration of rigorous and relevant learning beyond minimum requirements (participation and achievement in higher level courses, specialized courses, etc.).					
	Exemplary	Very Good	Acceptable	Approaching Acceptable	Needs Improvement
Student performance in Stretch Learning is expressed in objective terms					
School has trend data that reflects sustained performance at high levels for several years					
Staff fully understand the indicators for Stretch Learning and can relate their work to achievement in the indicators					
Majority of instruction is high rigor and high relevance — Quadrant D of the Rigor/Relevance Framework					
Local diploma requirements exceed those required by the state					
Students regularly exceed diploma requirements in credits earned					
Interdisciplinary work and projects (e.g., senior exhibitions) are common among all students					
Students earn college credits prior to graduation (dual enrollment)					
Enrollments are high in Advanced Placement or International Baccalaureate programs					
Enrollments are high in honors or advanced math or science courses					
Student population subgroups are equally represented in advanced level courses					
Students complete career majors or career/technical education programs					
Students are completing four or more credits in a career and technical education program					
Students are completing four or more credits in fine/performing arts					
Students are completing three or more years of a second language					
Students are awarded specialized certificates (e.g., Microsoft, Cisco Academy)					
Students with disabilities are served in regular education classes with support services as necessary					

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Learner Engagement — Data, structures, and conditions that reflect:

- positive behaviors that indicate full participation in the learning process by students, but also by administrative and teaching staffs
- students' and the staff's sense of satisfaction, belonging, security, and accomplishment
- a motivated commitment to learning, now and in the future

	Exemplary	Very Good	Acceptable	Approaching Acceptable	Needs Improvement
Student measures of Learner Engagement are expressed in objective terms					
School has trend data that reflects sustained or high levels of Learner Engagement for several years					
Staff fully understands the indicators for Learner Engagement and can relate their work to achievement in the indicators					
There is no significant difference in performance across subgroups					
The school has developed benchmarked comparisons for Learner Engagement with like groups of schools in focus, community, and structure					
Students in class show positive body language, are focused, verbally participate, and show confidence and enthusiasm for learning					
Students in class receive individual attention, can describe intended learning, feel work is meaningful, demonstrate higher-level thinking and are committed to doing quality work					
School has high level of retention (low dropout rate)					
School has high level of daily attendance					
School has high graduation rates					
School has few discipline referrals					
School has high participation rates in extracurricular activities					
School has high participation rate in interscholastic sports					
School has high enrollment in higher education					
School has few tardiness problems					

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Personal Skill Development - Measures of personal, social, service, and leadership skills - Demonstrations of positive behaviors and attitudes					
	Exemplary	Very Good	Acceptable	Approaching Acceptable	Needs Improvement
Student measures of Personal Skill Development are expressed in objective terms					
School has trend data that reflects sustained performance at high levels for several years					
Staff fully understand the indicators for Personal Skill Development and can relate their work to achievement in the indicators					
There is no significant difference in student performance across subgroups					
Students demonstrate self management including perseverance, time management, and the ability to plan and set goals, organize work, and control emotions.					
Students demonstrate social awareness through concern for others, assisting others in various social issues, respect for diversity, and/or participation in service learning					
Students demonstrate social facility including respect for others, communicating opinions and ideas, resolving conflict, trustworthiness, following group norms, and working as members of a team					
Students demonstrate a sense of belonging to the school community					
Students demonstrate curiosity and creativity in learning					
Students develop leadership skills through responsibilities in the school and school-related activities					
Students possess the confidence to take action in their personal lives and learning					

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Summary

Component	Exemplary	Very Good	Acceptable	Approaching Acceptable	Needs Improvement
Core Academic Learning					
Stretch Learning					
Learner Engagement					
Personal Skill Development					

Purpose

Many educators accept a school's culture as a given, even though often they become frustrated because the ingrained culture — the “way” of doing things — does not make room for new initiatives and programs that promote a change in structure or learning strategy. School culture can be changed to include new ways of encouraging student engagement practices. To define the culture, it is important to focus on three key elements of a school culture that reflects rigor, relevance, and relationships (RRR).

Practices are the individual initiatives that can, over time, begin to influence culture. The success of these practices requires persistence and follow-up.

Conversations are the most important transformer of school culture. People, and students in particular, can change what they believe to be true. However, they need an opportunity to express their opinions to test a new belief. Leaders begin to change the culture by cultivating conversations in which ideas can be introduced, challenged, and contemplated. What we talk about in school matters. Teachers, administrators, and others can influence the beliefs in school by paying attention to the topics of conversation.

Artifacts are the tangible evidence of a particular school culture. Examples include academic award banners and displays of student work. Introduce, move, or replace the artifacts to begin to influence the characteristics of the culture.

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Procedure

The following checklist can be useful in reflecting on school culture and can be used in several ways.

- School leaders can use this checklist to evaluate current culture.
- Teams can use this checklist to reflect on their practices and plan continuous improvement.
- School leadership teams can use this checklist as an agenda of the issues that must be resolved in creating a culture of RRR.

Checklist for Culture of Rigor, Relevance, and Relationships

Definitely	Partially	No	Practices
☐	☐	☐	• Conditions and personnel in the school are inviting and welcoming, which encourages and supports parental involvement.
☐	☐	☐	• Students perceive staff as caring and concerned with their education achievement.
☐	☐	☐	• The school is designed to promote sustained student relationships with adults.
☐	☐	☐	• The schedule is designed to promote sustained student relationships with adults.
☐	☐	☐	• Students have an adult advocate and a personal plan for progress.
☐	☐	☐	• Staff are dedicated to helping <i>all</i> students meet state and local standards.
☐	☐	☐	• Teachers treat students and their ideas with dignity and respect.

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Definitely Partially No

☐	☐	☐	• All staff members, including bus drivers, cafeteria workers, custodians, and office personnel, are seen as contributors to achieving the mission of the school.
☐	☐	☐	• The school celebrates both student and faculty achievement.
☐	☐	☐	• All students are regularly encouraged to do their best work and to “go the extra mile.” Extra effort is encouraged and rewarded.
☐	☐	☐	• The school has in place specific strategies for ensuring all staff have high expectations for each and every student.
☐	☐	☐	• Instruction includes appropriate assessments aligned with the high rigor and relevance expectations.
☐	☐	☐	• Instruction uses strategies that are aligned with the rigor and relevance of expectations.
☐	☐	☐	• Instruction uses a variety of strategies that match the expected level of rigor and relevance and learning styles of students.
☐	☐	☐	• Teachers regularly reflect on current practice and offer suggestions for improvements.

Conversations

Definitely Partially No

☐	☐	☐	• Staff talk about the goals of rigor, relevance, and relationships, with no apparent dissenters.
☐	☐	☐	• Students’ conversations focus positively on achievement and high expectations.
☐	☐	☐	• Students have a clear and ambitious picture of what they will do in the future.
☐	☐	☐	• Students know and understand the meaning of rigor and relevance and talk about how to increase the level of rigor and relevance in the classroom.
☐	☐	☐	• Leadership teams talk positively about school improvement working toward rigor, relevance, and relationships

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			Artifacts
Definitely	Partially	No	
☐	☐	☐	• References to high student expectations for rigor, relevance, and relationships appear in vision and mission statements of the school.
☐	☐	☐	• The commitment to rigor, relevance, and relationships is reflected in student and teacher handbooks.
☐	☐	☐	• The need for high student expectations for rigor, relevance, and relationships is communicated to parents and community in newsletters, reports, and school policies; at school events and parent conferences; and on the school's Web site.
☐	☐	☐	• The school's emphasis on learning is reflected in the displays, posted materials, and awards within the building.
☐	☐	☐	• Classrooms have samples of high-quality student work on display.



Effective 9th Grade Academies

Purpose

The focus for many high schools striving to improve student achievement is ninth grade. It is early in high school that many students fall behind and most continue to struggle. Traditionally, high school staff looked at the high expectations of high school as a way to challenge students and if students failed courses they would have to repeat and make them up during their high school career. However, most of these students never catch up. The evidence shows that 9th grade is the last chance rather than the first chance for students to be successful in high school. The work of the International Center has identified many exemplary practices in 9th grade to ensure student success not only in the 9th grade but throughout high school. The practices are detailed in the resource kit, *Reinventing 9th Grade – Academics Through Personalization*.

Procedure

The following checklist can be useful in reflecting on 9th grade best practices. It can be used in several ways.

- School leaders can use this checklist to evaluate current 9th grade academies.
- 9th e teacher academy teams can use this checklist to reflect on their practices and plan continuous improvement.
- School leadership teams can use this checklist as an agenda of the issues that must be resolved in creating 9th grade academies.

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Definitely	Partially	No	9th Grade Academy Checklist
☐	☐	☐	Achievement has been collected and analyzed including failure rate and four-year on-time graduation rate (disaggregated by subpopulations).
☐	☐	☐	There are agreed-upon goals for the 9 th grade academy.
☐	☐	☐	There are accountability measures in place to insure that the 9 th grade goals are being met.
☐	☐	☐	There is significant support and encouragement from the district office and school board for the academy.
☐	☐	☐	Key publics are informed as you proceed with your planning – high school faculty, superintendent and district office personnel, school board, union leadership, parents, upper-class students.
☐	☐	☐	There is distributed leadership involving staff in providing leadership and decision making.
☐	☐	☐	There is a focus on building relationships at all levels – adult to student, adult to adult, student to student, teacher to administration, teacher to parents, etc.
☐	☐	☐	Programs and services at 10 th grade build upon progress at 9 th grade.
☐	☐	☐	There is an advisor/advisee program of some type that provides constant adult direction to students.
☐	☐	☐	Upper-class student leaders act as peer leaders or mentors for 9 th grade success.
☐	☐	☐	Dedicated counselors are provided for the 9 th grade academy.
☐	☐	☐	Ninth grade students have adequate options for extracurricular clubs and sports.
☐	☐	☐	There is regular communication with parents.
☐	☐	☐	There is an intake process that builds relationships with students and establishes clear high expectations.
☐	☐	☐	Ninth grade classrooms are grouped together somewhere in the building.
☐	☐	☐	The strongest teachers are recruited for 9 th grade instruction.
☐	☐	☐	There is a belief among staff that “we simply will not allow freshmen to fail.”
☐	☐	☐	There is a team of core academic teachers working with a group of students.
☐	☐	☐	Collaboration skills are strong among 9 th grade team members.

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Definitely Partially No

☐	☐	☐	Teams have a common planning/preparation time scheduled for the teachers.
☐	☐	☐	There are literacy/reading intervention strategies.
☐	☐	☐	There are effective strategies in place to assist 9 th graders who are “reading challenged.”
☐	☐	☐	Transition, shared expectations assessments, and teacher collaboration occur between 8 th and 9 th grade.
☐	☐	☐	Class sizes are manageable for 9 th grade instruction.
☐	☐	☐	Instruction is personalized.
☐	☐	☐	Academically challenged 9 th graders are working on core basics through engaging classes.
☐	☐	☐	There is an emphasis on curriculum integration and/or interdisciplinary teaching.
☐	☐	☐	Ninth grade teachers use a common instructional model.
☐	☐	☐	Social activities are held to build common spirit among 9 th grade.
☐	☐	☐	Professional development is provided to assist teachers in designing lessons that are both rigorous and relevant.
☐	☐	☐	Staff currently have a consistent unity of purpose in enforcing necessary school rules and regulations.
☐	☐	☐	Teachers model school civility and student character.
☐	☐	☐	Guiding principles of character appropriate for the school and community are in place.
☐	☐	☐	Academic intervention strategies are in place.
☐	☐	☐	An agreed-upon pyramid of academic interventions has been designed and communicated.
☐	☐	☐	Academic assistance programs are in place beginning in grade 8 and continuing during the summer before grade 9 begins.
☐	☐	☐	There are voluntary and mandatory tutorials in place.
☐	☐	☐	Students have options for credit recovery.
☐	☐	☐	There is a reading/literacy plan for the 9 th grade program.



Leadership for Reading in the Content Areas

Purpose

Reading is critical to achieving high levels of rigor and relevance. At the secondary level, most dedicated reading instruction has disappeared, and students are expected to read in order to learn content. Teachers are frequently working around reading issues to allow students to demonstrate mastery of content with little improvement in reading. This may marginally work for low rigor/low relevant instruction, but it is totally insufficient when instruction moves up the scale of rigor and relevance. It is the school leader that must focus staff on literacy goals and also support the development of skills in reading in the content area.

In middle schools and high schools, textbooks and instructional materials are content driven, with no uniform degree of reading difficulty. Teachers select the text that covers the content, not the text that is most readable to most students.

Each subject is likely to have its own specialized vocabulary and concepts presented through a variety of text sources and writing styles. Some courses have hundreds or thousands of new vocabulary words that students are expected to learn, multiplied by six different courses students study in any given year.

While content area teachers are often the first to recognize the problem of inadequate reading skills, they also feel unprepared to address the issue. They have little training in the teaching of reading skills. These teachers are concerned that teaching reading will take time away from covering course content.

Teachers need to increase:

- time for independent reading with leveled text selections matched to the students' reading levels (independent levels, not instructional levels)

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- data-driven decisions in selecting instructional materials
- time spent reading in the content areas
- fluency of reading proficiency
- evaluations that focuses on higher-order thinking skills
- use of writing before and after reading
- collaborative activities
- teaching reading as a process
- teacher modeling

Teachers need to decrease:

- assigning reading and expecting students to figure it out
- exclusive use of whole class reading
- teacher selection of all reading materials
- solitary seatwork
- selection of a course text without regard to reading difficulty

Literacy is not someone else's job; it is the responsibility of every teacher. It is the role of the instructional leader to provide commitment, resources, and support to address literacy issues.

Procedure

Use the Leadership for Reading in the Content Area Checklist individually or with teacher teams to assess the level of attention that reading in the content area is receiving in your school.

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Definitely Partially No

☐	☐	☐
☐	☐	☐
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Leadership for Reading in the Content Area Checklist

1. Literacy is an important priority throughout the school.
2. There are clear, measurable goals for levels of student reading.
3. A standard measure of reading, such as Lexile, is used to describe all aspects of reading achievement.
4. Literacy development is addressed in all disciplines.
5. Student literacy levels are measured continuously, and this data is compared to literacy achievement goals.
6. Faculty has convenient access to data on reading levels of their students.
7. Staff knows the reading levels reflected in their textbooks and other instructional materials.
8. Staff makes selections of instructional materials to appropriately challenge students.
9. Students below reading goals are tested frequently.
10. Students are assigned to academic courses based upon reading level data.
11. Teachers use pre-reading, vocabulary, and post-reading strategies to improve reading in the content area.
12. Teachers know the reading level requirements for post school, including college, employment, and personal use.
13. Teachers regularly share reading strategies.
14. Academic intervention services are available to provide additional help to students needing reading assistance.
15. Instructional coaches are available to assist teachers in improving instructional strategies related to reading.
16. Teachers personalize instruction to accommodate different levels of reading in the classroom.
17. School media center is aligned with reading level information and is an integral part of the literacy program.
18. Students have opportunities to apply reading skills by tutoring younger students.
19. Students are challenged to increase reading fluency as well as comprehension.
20. State assessments in all subjects have been analyzed as to the reading level.

Purpose

Preparation

Procedure

Complete the following Rigorous and Relevant Teaching and Learning Checklist. This checklist can be used in several ways. An administrator or team leader can use the list to identify instructional strengths and areas in need of improvement. Individual teachers can use this to reflect on their own instructional practices.

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Rigorous and Relevant Teaching and Learning Checklist

YES	NO	
		The teaching design ...
☐	☐	is planned using data on students and curriculum
☐	☐	is clearly linked to priority state standards
☐	☐	has an expectation for levels of rigor and relevance
☐	☐	uses appropriate assessments aligned with the rigor and relevance of expectations
☐	☐	is clearly guided by big ideas and essential questions
☐	☐	uses strategies that are aligned with the rigor and relevance of expectations
☐	☐	includes the knowledge and skills necessary for expected student performance
☐	☐	uses authentic performance tasks calling for students to demonstrate their understanding and apply knowledge and skills
☐	☐	uses clear evaluation criteria and performance standards evaluations of student products and performances
☐	☐	uses a variety of resources (the textbook is only one resource among many)
		The classroom ...
☐	☐	has student work and essential questions as central to classroom activities
		has high expectations and incentives for all students to achieve the expected performance
☐	☐	has a culture that treats students and their ideas with dignity and respect
☐	☐	displays evaluation criteria or scoring guides
☐	☐	has samples of high-quality student work on display
		The teacher ...
☐	☐	informs students of the expected performance, essential questions, performance requirements, and assessment criteria at the beginning of the lesson or unit
☐	☐	engages students' interest when introducing a lesson
☐	☐	uses a variety of strategies that match the expected level of rigor and relevance and learning styles of students

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YES NO

☐	☐	facilitates students' active construction of meaning (rather than simply telling)
☐	☐	effectively uses questioning, coaching, and feedback to stimulate student reflection
☐	☐	facilitates student acquisition of basic knowledge and skills necessary for student performance
☐	☐	differentiates instruction to meet individual student needs
☐	☐	adjusts instruction as necessary on reflection and feedback from students
☐	☐	uses information from ongoing assessments to check for student learning and misconceptions along the way
☐	☐	uses a variety of resources to promote understanding

The students ...

☐	☐	can describe the goals (student performance) of the lesson or unit
☐	☐	can explain what they are doing and why (i.e., how today's work relates to the larger unit or course goals)
☐	☐	are engaged throughout the lesson or unit
☐	☐	can describe the criteria by which their work will be evaluated
☐	☐	are engaged in activities that help them to apply what they have learned
☐	☐	demonstrate that they are learning the background knowledge and skills that support the student performance and essential questions
☐	☐	have opportunities to generate relevant questions
☐	☐	are able to explain and justify their work and their answers
☐	☐	use the criteria or scoring guides to revise their work



Raising the Level of Rigor and Relevance

Purpose

Raising the level of rigor and relevance is neither easy nor quick. Clearly making the journey to rigor and relevance begins by looking at the societal changes influencing education and helping teachers understand how to apply the Rigor/Relevance Framework. However, just creating a sense of urgency and giving teachers the techniques of raising rigor and relevance will not make it happen. There are several ongoing strategies that must be in place to raise the level of rigor and relevance.

Those strategies are:

Rubrics — assessments including scoring guides and checklists used to measure learning in student performance

Reading — the fundamental skill that is a prerequisite for nearly all learning

Reflective thought — behavior that causes students to pause, think, question, and reflect as part of the learning process

Revision — improvement of teaching and learning through experimentation, reflection, and sharing best practices

Research — analytical evaluation of innovative practices

Resilience — the character trait that causes students to try again, struggle to achieve, and bounce back from poor performance in the education process

Relationships — the positive connection between students and their peers, parents, and teachers that supports them to achieve at high levels

Reschedule — revisions to master schedules of teachers and students to better meet student needs

Rejuvenation — professional development that ignites passion in the classroom and energizes teaching with new ideas and strategies

Rewards — recognition and awards provided to students and staff for accomplishing higher levels of achievement

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Procedure

It is essential to use and maintain some or all of the strategies mentioned above. Use the following checklist as a personal scorecard to evaluate the progress you are making toward rigor and relevance. Also, use this with teacher teams to have them reflect on the practices that the school is doing well and where there is need for improvement.

			Signposts on the Road to Rigor and Relevance Checklist
Yes	Partial	No	Rubrics
☐	☐	☐	Common rubrics are used throughout the school for typical performances such as student writing and presentations.
☐	☐	☐	Teachers are proficient in creating and adapting rubrics to their instruction.
☐	☐	☐	Students are informed of evaluation criteria in advance of completing their work.
☐	☐	☐	Teachers share rubrics among other teachers.
☐	☐	☐	Teacher use rubrics beyond those required for reporting grades.
Yes	Partial	No	Reading
☐	☐	☐	All teachers use reading in the content strategies as part of instruction.
☐	☐	☐	Teachers have access to data on the reading level of each of their students.
☐	☐	☐	Reading level of students is measured frequently to determine progress.
☐	☐	☐	Teachers know the reading level of materials used in the classroom.
☐	☐	☐	Teachers differentiate instruction to accommodate different reading levels of students.
Yes	Partial	No	Reflective Thought
☐	☐	☐	Teachers often create student work that requires students to develop an answer rather than recall an answer.
☐	☐	☐	Teachers give students time to think in classroom instruction.
☐	☐	☐	Teachers help students relate learning to student background and personal experience.
☐	☐	☐	Teachers frequently use the inquiry method to encourage students to pose questions.
☐	☐	☐	Students have opportunities to reflect on the quality of their work and summarize what they have learned.

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Signposts on the Road to Rigor and Relevance Checklist (continued)

Yes	Partial	No	Revision
☐	☐	☐	Teachers share innovative lessons with other teachers.
☐	☐	☐	Teachers have opportunities to observe other classrooms demonstrating best instructional practices.
☐	☐	☐	Teachers have access to adequate technology for integration of technology in instruction.
☐	☐	☐	There is a common structure to lesson plan development across subjects or grades.
☐	☐	☐	Teachers collaborate in development of interdisciplinary lessons.
Yes	Partial	No	Research
☐	☐	☐	Teachers collect data to evaluate effectiveness of innovative practices.
☐	☐	☐	Teachers select innovations and instructional programs based on research data.
☐	☐	☐	Teachers visit other classrooms and schools to identify best practices.
☐	☐	☐	Teachers analyze data on students to identify strengths, weaknesses, and interests to differentiate instruction.
☐	☐	☐	Teachers stay current in the profession by reading journals and participating in professional organizations.
Yes	Partial	No	Resilience
☐	☐	☐	Teachers know individual student's strengths and give them daily opportunities to use their strengths.
☐	☐	☐	There are ample opportunities for students to explore interests through in-class and other school activities.
☐	☐	☐	The school uses a variety of recognitions to "catch" students succeeding.
☐	☐	☐	School provides a safe and secure atmosphere where students are comfortable and willing to take risks.
☐	☐	☐	Students who fail or act out and are removed from schools have ample opportunity to re-enter the system.

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(continued) Signposts on the Road to Rigor and Relevance Checklist

Yes	Partial	No	Relationships Students actively support each other while attaining higher levels of achievement. Teachers work with students frequently outside of classroom instruction. Parents and community members are frequent participants in school activities. Teachers consistently exhibit behaviors that show they care about and respect students. Each student has an adult advocate that knows the student well and meets regularly to identify needs, problems, and accomplishments.
Yes	Partial	No	Reschedule The length of instructional periods allows for students to complete projects and problems consistent with high rigor/high relevance. Teacher teams have the flexibility to modify the schedule to meet student needs. The master schedule is designed around the needs of students. The schedule provides planning time for teachers to discuss student needs and plan interdisciplinary projects. Teachers are skilled in maximizing all of instructional time.
Yes	Partial	No	Rejuvenation Teachers are encouraged to participate in self-directed professional learning. Teachers collaborate frequently by sharing ideas and strategies. Coaches are available to work with teachers individually on professional development priorities. New teachers are provided with mentors and time to meet with them. School or district professional development is personalized to teacher needs.
Yes	Partial	No	Rewards Students are recognized in a wide variety of events and activities. Students and staff celebrate schoolwide academic achievement. Students get frequent feedback from teachers about the quality of their work. Incentives are provided to teachers who take on extra work or make outstanding contributions. Both parents and the community provide rewards and recognition to students.



Lesson Review

Purpose

This activity gives teachers an opportunity to apply the Rigor/Relevance Framework to review instruction and reflect on strategies to achieve rigor and relevance.

Preparation

Materials

Copies of the Review of Lessons Questions
Rigor/Relevance Framework

Procedure

Time

30-40 minutes

1. Obtain videos of typical instruction. One source is the Instructional Study of the Trends in International Mathematics and Science Study (TIMSS), which can be obtained from sources listed on the National Center for Education Statistics Web site (<http://nces.ed.gov/timss/FAQVideo.asp>).
2. Examine the Review of Lessons Questions with teachers. Show the videos. Allow time to discuss the observations of teachers and their answers to the questions. These discussions will aid teachers in reflection on their own level of rigor and relevance in instruction.

Review of Lessons Questions

1. What does the teacher expect students to learn (standards)?
2. What is the intended level of rigor and relevance? In which quadrant on the Rigor/Relevance Framework does this lesson fall?
3. What instructional strategies are used?
4. Does the lesson meet the teacher's expectation for student learning? Why or why not?
5. What are the strengths and weaknesses of this lesson?

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After a walkthrough, arrange to have debriefings. These can be handled in two ways. If the intent is to determine the overall student engagement levels of a school, the debriefing would be for the entire group of staff members without making references to individual teachers. If the feedback or observation is intended to coach teachers after observing how they conducted their classrooms, then it is important to meet with these teachers individually to discuss the observations made during the walkthrough.

Student Engagement Characteristics Checklist

Many classroom walkthroughs blend measures of student engagement with measures of instructional practice. Although this is a good way to view effective learning, sometimes we need to pay more attention simply to how well students are engaged rather than on what kind of instruction is being delivered or how the classroom is set up. In this way, we become more focused on the learner rather than on the teacher.

The Student Engagement Walkthrough Checklist that follows examines the degree to which students are exhibiting engaging behaviors, regardless of what is being taught. This observation is meant to help reach agreement in defining high degrees of student engagement.

As administrators and instructional supervisors conduct classroom walkthroughs, they can use the checklist to rate the level of student engagement in each of the categories. The first part is based on direct observation of students and includes these criteria: positive body language, consistent focus, verbal participation, student confidence, and fun and excitement. The second part of the checklist requires more than direct observation. It requires talking to students to determine more about their mental engagement. These

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criteria include: attention to individual needs, clarity of learning, meaningfulness of work, rigorous thinking, and performance orientation. There are several questions for each criterion to gauge the level of student engagement. Each criterion is rated on a scale from “very low” to “very high.” An overall level of student engagement can be determined using the compilation of the criteria ratings.

Teachers can use this checklist as a reflective tool to examine themselves and determine the level of engagement in their classrooms. Sometimes it is difficult for teachers to evaluate themselves. However, sharing this checklist with them can help to establish common definitions of highly engaged students, reflect on practices, and share instructional ideas that contribute to increased levels of student engagement.

Student Engagement Characteristics: Part 1

First, the observer must examine the following set of characteristics of engagement. These direct observations include:

- **Positive body language.** Students exhibit body postures that indicate listening and attention to the teacher and/or other students. Eye contact, head position, leaning forward or backward, and positions of arms all indicate a student’s level of interest and attention.
- **Consistent focus.** Students are focused on the learning activity with minimum disruptions. Consider these questions regarding student behavior during the entire observation: Are students focused on the learning experience? Does their attention waiver because of lack of interest, lack of knowledge of how to proceed, frustration, or some outside distraction?

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- **Verbal participation.** Students express thoughtful ideas and answers. They ask questions that are relevant or appropriate to learning. Student participation is not passive; it involves sharing opinions and reflecting on complex problems.
- **Student confidence.** Students exhibit confidence to initiate and complete a task with limited coaching or approval-seeking and can actively participate in team-based work.
- **Fun and excitement.** Students exhibit interest and enthusiasm and use positive humor.

Student Engagement Characteristics: Part 2

The second part of the observation requires conversations with students to gather details about the degree to which they are engaged in a learning experience. There are five strategies for measuring perception of engagement. For each aspect, questions are provided to encourage conversations with students.

- **Individual attention.** Students feel comfortable in seeking help and asking questions.
- **Clarity of learning.** Students can describe the purpose of the lesson or unit. This is more comprehensive than describing the activity based on the lesson of the day.
- **Meaningfulness of work.** Students find the work interesting, challenging, and connected to learning.
- **Rigorous thinking.** Students work on complex problems, create original solutions, and reflect on the quality of their work.
- **Performance orientation.** Students understand what quality work is and how it will be assessed. They also can describe the criteria by which their work will be evaluated.

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Student Engagement Walkthrough Checklist

OBSERVATIONS

	Very High	High	Medium	Low	Very Low
Positive Body Language	☐	☐	☐	☐	☐

Students exhibit body postures that indicate they are paying attention to the teacher and/or other students.

Consistent Focus	☐	☐	☐	☐	☐

All students are focused on the learning activity with minimum disruptions.

Verbal Participation	☐	☐	☐	☐	☐

Students express thoughtful ideas, reflective answers, and questions relevant or appropriate to learning.

Student Confidence	☐	☐	☐	☐	☐

Students exhibit confidence and can initiate and complete a task with limited coaching and can work in a group.

Fun and Excitement	☐	☐	☐	☐	☐

Students exhibit interest and enthusiasm and use positive humor.

PERCEPTIONS

	Very High	High	Medium	Low	Very Low
Individual Attention	☐	☐	☐	☐	☐

Students feel comfortable seeking help and asking questions.

Question to Ask: What do you do in this class if you need extra help?

Clarity of Learning	☐	☐	☐	☐	☐

Students can describe the purpose of the lesson or unit. This is not the same as being able to describe the activity being done during class.

Questions to Ask: What are you working on? What are you learning from this work?

Meaningfulness of Work	☐	☐	☐	☐	☐

Students find the work interesting, challenging, and connected to learning.

Questions to Ask: What are you learning? Is this work interesting to you? Do you know why you are learning this?

Rigorous Thinking	☐	☐	☐	☐	☐

Students work on complex problems, create original solutions, and reflect on the quality of their work.

Questions to Ask: How challenging is this work? In what ways do you have the opportunity to be creative?

Performance Orientation	☐	☐	☐	☐	☐

Students understand what quality work is and how it will be assessed. They also can describe the criteria by which their work will be evaluated.

Questions to Ask: How do you know you have done good work? What are some elements of quality work?

Overall Level of Student Engagement	☐	☐	☐	☐	☐

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More Student Engagement Checklists

Administrators and instructional supervisors can also use one or more of the following checklists to rate practices related to student engagement. Schools also could combine or modify the checklists to give staff more ownership and agreement about what are the best instructional practices.

Relationships			
Definitely	Partially	Not Observed	
☐	☐	☐	1. The teacher exhibits behaviors that indicate care and concern about students.
☐	☐	☐	2. The teacher calls students by name.
☐	☐	☐	3. Students have opportunities to ask the teacher questions about what they are learning.
☐	☐	☐	4. The teacher pays attention to all students, not just the top students.
☐	☐	☐	5. The teacher is willing to provide extra help in order for students to succeed.
Guiding Principles			
Definitely	Partially	Not Observed	
☐	☐	☐	1. Instruction is free of negative attitudes and behaviors (e.g., biases, stereotyping, put-downs, racial slurs, gossip, insensitive gender remarks).
☐	☐	☐	2. The teacher models and practices social skills that demonstrate guiding principles (e.g., interrupting politely, active listening, constructive feedback, respectful communication).

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☐	☐	☐	3. Students have opportunities to put guiding principles into action in ways that promote student autonomy, social responsibility, and caring relationships (e.g., cooperative learning, community service, class meetings, democratic participation, cross-age and peer tutoring, student governance, conflict resolution).
☐	☐	☐	4. Instruction integrates academic content with guiding principles.
☐	☐	☐	5. Student recognition encourages intrinsic motivation (i.e., helping students recognize the internal “feel good” benefits of positive acts) and discourages reliance on extrinsic incentives (e.g., material rewards).
Rewards and Grading			
Definitely	Partially	Not Observed	
☐	☐	☐	1. The teacher gives frequent verbal feedback about the quality of student work.
☐	☐	☐	2. Student praise is primarily public, and student criticism usually is made privately.
☐	☐	☐	3. The teacher routinely uses symbols or public displays to recognize high-quality student work.
☐	☐	☐	4. The teacher maintains a system for tracking completion of students' assignments.
☐	☐	☐	5. Students reflect on the quality of their work as part of the grading process.
Student Habits			
Definitely	Partially	Not Observed	
☐	☐	☐	1. The classroom routines are consistent and predictable from day-to-day.
☐	☐	☐	2. Routines for entering, exiting, and moving within the classroom are taught, reviewed, and reinforced on a regular basis.

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☐	☐	☐	3. Classroom rules regarding behavior expectations are posted, taught, reviewed, and reinforced on a regular basis
☐	☐	☐	4. Students follow classroom procedures.
☐	☐	☐	5. Routines for handling materials and supplies occur smoothly, with little loss of instructional time.

Foundation Learning Skills			
Definitely	Partially	Not Observed	
☐	☐	☐	1. Students use planning/organizational skills to complete in-class tasks and homework.
☐	☐	☐	2. Students take notes and record key information for future reference.
☐	☐	☐	3. Students practice active listening (e.g. body posture, giving feedback, asking questions, and summarizing a lesson).
☐	☐	☐	4. Students possess abilities to stay on task and work independently.
☐	☐	☐	5. Students work cooperatively in small groups.

Design for Rigor and Relevance			
Definitely	Partially	Not Observed	
☐	☐	☐	1. Instruction is well planned and prepared in advance.
☐	☐	☐	2. Instruction has a clear expectation for levels of rigor and relevance using the four quadrants of the Rigor/Relevance Framework.
☐	☐	☐	3. Instruction is built with the goal of culminating in a performance task.
☐	☐	☐	4. Instruction call for students to demonstrate their understanding and apply knowledge and skills in activities and tasks.
☐	☐	☐	5. Instruction uses varied resources; the textbook is only one resource among many.

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Active Learning Strategies			
Definitely	Partially	Not Observed	
☐	☐	☐	1. Students discuss and solve open-ended questions and problems.
☐	☐	☐	2. The teacher engages all students in higher order thinking activities.
☐	☐	☐	3. The teacher challenges students to think deeply and critically with a standards-based curriculum.
☐	☐	☐	4. The teacher facilitates students' active construction of meaning (rather than simply telling).
☐	☐	☐	5. Instruction is student-centered, with emphasis on student choice of materials and activities, interaction, and construction of knowledge.
Literacy Focus			
Definitely	Partially	Not Observed	
☐	☐	☐	1. The teacher makes selections of instructional materials to challenge students appropriately.
☐	☐	☐	2. The teacher uses pre-reading strategies to improve comprehension.
☐	☐	☐	3. The teacher uses vocabulary strategies to introduce new words and improve reading in the content area.
☐	☐	☐	4. The teacher uses post-reading strategies to improve comprehension.
☐	☐	☐	5. The teacher personalizes instruction to accommodate different levels of reading in the classroom.
Personalization			
Definitely	Partially	Not Observed	
☐	☐	☐	1. Students express themselves through writing and classroom discussion tied to learning.
☐	☐	☐	2. Assignments provide opportunities for individual choice.

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☐	☐	☐	3. The teacher provides timely, formative feedback to students on the quality of their work.
☐	☐	☐	4. The teacher connects instruction to the daily lives of students and aspects of their experiences.
☐	☐	☐	5. The teacher accommodates students' questions about an interest in external events.
Classroom Environment			
Definitely	Partially	Not Observed	
☐	☐	☐	1. The classroom is colorful and has several mentally stimulating displays.
☐	☐	☐	2. Seating arrangements facilitate collaboration and discussion.
☐	☐	☐	3. The classroom comfortably accommodates the number of students in it.
☐	☐	☐	4. Evidence of student work is displayed in the classroom.
☐	☐	☐	5. Learning goals and objectives are posted.

Purpose

Procedure

- 1 **Benchmark tasks.** Incorporate these tasks in a checklist of what to do and steps to take. Rate the progress of school staff periodically to reflect on where progress is being made and what remains to be done.
- 2 **Implementation actions.** Record your personal goals and actions for further implementation.
- 3 **Evidence.** Collect examples of school success. Consider them a student engagement scrapbook. Insert good examples of high student engagement lessons or practices. Specific examples of relationship development should be kept here as well. This evidence can be used to show progress to new staff, district leaders, or visiting educators.
- 4 **Reflection.** Periodically make notes of progress and needs. The reflection questions (at the end of this activity) will guide you to the important aspects of change. The idea is to jot down some notes to organize thoughts and reminders for future work.

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Benchmark Tasks for Student Engagement

Pervasive	Considerable	Partial	Initiated	Absent	
					Student Learning
					Establish and data measures that relate to student engagement and personal skills development.
					Analyze Learning Criteria data on Core Academic and Stretch Learning related to student engagement.
					Analyze data on improvement of the Learning Criteria on Learner Engagement.
					School Culture
					Foster a school culture that provides students with a sense of equity.
					Foster a school culture that provides students with a feeling of community.
					Foster a school culture that provides students with expansive opportunities.
					Foster a school culture that provides students with individual responsibility.
					Foster a school culture that provides students with challenging experiences.
					Foster a school culture of high expectations.
					Involve staff in discussions to understand, embrace, and reflect on the need for student engagement.
					Establish and implement guiding principles in the school.
					Celebrate achievement.
					Establish common definitions of student engagement and how to measure it.
					Make instructional coaches available to assist teachers in improving strategies for better engagement practices.
					Conduct student and staff focus groups to determine ways to improve engagement.
					Review and revise school grading policies to encourage high levels of student engagement.

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					Instructional Practice
					Identify and share examples of positive student engagement.
					Develop staff ability to create classroom procedures that build learning relationships.
					Encourage teachers to personalize instruction to accommodate unique student needs.
					Make literacy an important priority throughout the school.
					Conduct frequent walkthroughs to observe instruction.
					Provide for and monitor classroom space to ensure that it is safe, clean, adequate in size, properly equipped, and well maintained.

Implementation Actions

Plan your specific actions. What will you do? Refer to reference materials from this resource kit you will use and set specific goals and deadlines. Use any of the included forms, or create your own. Following is a template for an action planning form.

Identify the objective of a follow-up action. Then brainstorm and identify actions to be taken, indicate who will take responsibility, and make a deadline for when these actions should be accomplished. Identify the data or measure that will be used to evaluate the effectiveness of the actions taken.

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Action Planning

Identified objective: What do you plan to accomplish?

Actions to be taken: What do you plan to do?	Who will do this?	By when?

Evidence

Keep a scrapbook or journal of the progress made in enhancing student engagement. Place copies of written materials, model lesson plans, memos, photographs of student work, descriptions of student engagement, and other items in this section.

Reflection

Jot down reflections on progress made in improving student engagement. Use the following reflection questions as a guide to analyze the changes toward improved student engagement.

Reflection Questions

- Is the vision clear and accepted so that you hear others repeat the vision?
- Is the focus of decisions on the needs of students?

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- Do staff identify current successful student engagement practices without defending all current practice?
- Are the right people involved in leadership roles?
- Do staff feel comfortable and empowered to take risks and innovate?
- Is there a consensus of action agreed upon by all staff?
- Are staff excited about continual learning and frequently sharing ideas?
- Are staff needs identified and met?
- Do staff feel supported in making changes?
- Are adequate resources provided?
- Has the school focused on success and celebrated achievements?
- Do leaders follow through?

Purpose

Procedures

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Definitely	Partially	No	School – Community Partnership Checklist
☐	☐	☐	There is a mission statement for school/business partnerships.
☐	☐	☐	The mission statement is a clear, concise statement of the purpose of the education partnership.
☐	☐	☐	School leaders and teachers are proactive in developing relationships with employers and community organizations.
☐	☐	☐	The mission statement considers the school, district, and partner's values and goals.
☐	☐	☐	The mission statement is used in public relations and marketing tools for targeted audiences (brochures, annual reports, newsletters, etc.)
☐	☐	☐	Strategies are developed to ensure ongoing awareness of school/business partnerships.
☐	☐	☐	A variety of methods are used to collect and assess information to determine the needs of the school, faculty, students, parents, community, and partners.
☐	☐	☐	A wide variety of methods are used to identify and secure human, material, and financial resources.
☐	☐	☐	The partnership goals reflect the educational goals of the school district and the needs of the school and partner.
☐	☐	☐	Specific partnership objectives and measurable goals provide a basis for monitoring and evaluation.
☐	☐	☐	The goals and objectives of the partnership are communicated to the school faculty, partners, students, and community.
☐	☐	☐	Partners visiting the school are made to feel welcome.
☐	☐	☐	Activities are identified in collaboration with partners.
☐	☐	☐	There is a formal, written management structure with designated contact people for each partner.
☐	☐	☐	Activities are integrated into the school and business culture.

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Definitely	Partially	No	
☐	☐	☐	Activities provide an opportunity for students, teachers, and business employees to interact with each other and the community.
☐	☐	☐	As personnel changes occur, relationships are established with new employees.
☐	☐	☐	Training is provided for all involved parties where necessary.
☐	☐	☐	There are procedures in place for volunteer involvement (public safety, health regulations, identification badges, parking, guidelines for attendance, etc.).
☐	☐	☐	Procedures for volunteers are clearly communicated to the school staff and partners.
☐	☐	☐	Role descriptions have been developed for each position involved in the partnership or program activity.
☐	☐	☐	Formal/informal orientation is available for every volunteer, principal, teacher, and student involved in partnership activities.
☐	☐	☐	Public recognition is planned for all participants in the school/business partnerships.
☐	☐	☐	There is a partnership evaluation coordinator in place with an established timeline and budget.
☐	☐	☐	Evaluation data is analyzed and recommended changes are made to improve the effectiveness of the partnership.
☐	☐	☐	Evaluation results are shared with the partnership participants and other appropriate audiences.