

# Brooklyn Democracy Academy

## FINAL REPORT



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# Introduction

## About This Report

This final report is the result of an external school curriculum audit (ESCA) of Brooklyn Democracy Academy by Learning Point Associates, an affiliate of American Institutes for Research. This audit was conducted in response to the school being designated as in need of improvement under the New York State Education Department differentiated accountability plan, pursuant to the accountability requirements of the Elementary and Secondary Education Act, as reauthorized by the No Child Left Behind Act. The ESCA process was developed for and carried out under the auspices of the New York City Department of Education (NYCDOE) Office of School Development, within the Division of Portfolio Planning.

## About Brooklyn Democracy Academy

Brooklyn Democracy Academy (K643) is located in Brooklyn in Community School District 23. The school serves approximately 199 students, of whom 87 percent are black or African-American, 11 percent are Hispanic, and 1 percent are Caucasian. Two percent of the students are English language learners, 14 percent receive special education services, and 42 percent are eligible for free or reduced priced lunch. The school is colocated in a building with three other district schools, including two middle schools and a diploma plus program.

Opened in 2008, as a partnership between the NYCDOE and the Jewish Child Care Association, Brooklyn Democracy Academy is a transfer school serving students between the ages of 16-20 who have chosen to reengage in high school after previously having dropped out of school or become excessively truant. The focus of the school is to provide intensive support and services to students to ensure continued attendance in school and progress toward graduation. Brooklyn Democracy Academy utilizes a variety of strategies to achieve this goal, including a Youth Development Model, heterogeneous grouping, rigorous, standards-based instruction, accelerated credit programs, and postsecondary readiness and skills development.

In 2009–2010, Brooklyn Democracy Academy did not make adequate yearly progress (AYP) in English language arts for all students, black and African-American students, and economically disadvantaged students. In 2010–2011, Brooklyn Democracy Academy's state accountability status was designated as "Improvement (Year 1)."<sup>1</sup> Because the school has been designated as in need of improvement, the school participated in an ESCA, which was conducted by Learning Point Associates, an affiliate of American Institutes for Research.

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<sup>1</sup><https://www.nystart.gov/publicweb-rc/2010/90/AOR-2010-332300011643.pdf>. Accessed on July 18, 2011.

## Audit Process at Brooklyn Democracy Academy

The ESCA approach utilized at the high school level examines six topic areas: student engagement, academic interventions and supports, support for incoming students, classroom instruction, professional development, and courses and extracurriculars. Data were collected at the school level through teacher surveys, administrator interviews, classroom observations, and an analysis of documents submitted by Brooklyn Democracy Academy during the month of March, 2011. From these data, Learning Point Associates prepared a series of reports for the school's use.

These reports were presented to the school during a co-interpretation<sup>SM</sup> meeting, held on June 16, 2011. During this meeting, nine stakeholders from the Brooklyn Democracy Academy community read the reports. Through a facilitated and collaborative group process, they identified individual findings, then developed and prioritized key findings that emerged from information in the reports.

The remainder of this report presents the key findings that emerged from the co-interpretation process, and the actionable recommendations that Learning Point Associates developed in response. Please note that there is not necessarily a one-to-one connection between key findings and recommendations; rather, the key findings are considered as a group, and the recommended strategies are those that we believe are most likely to have the greatest positive impact on student performance at the Brooklyn Democracy Academy.

# Key Findings

After considerable thought and discussion, co-interpretation participants determined a set of key findings. These findings are detailed in this section.

## Critical Key Findings

### **CRITICAL KEY FINDING 1:**

**Across all classrooms, there are inconsistent opportunities to engage in higher-order thinking, quality of feedback, and content understanding.**

Critical Key Finding 1 is supported by teacher surveys and classroom observations conducted by auditors. The survey was completed by approximately 93 percent of the instructional staff. According to respondents, the most frequently employed learning activities are: writing reflections, recording, representing, or analyzing data; and answering textbook or worksheet questions. About 85 percent of those surveyed indicated that students take part in these activities one or two times a week or daily. Co-interpretation participants noted that a majority of respondents (84.6 percent) indicated that students engage in extended projects at least one or two times a month or more. Finally, respondents were divided with regard to the frequency with which students engaged in portfolio work. About half of those surveyed indicated that students work on portfolios at least one or two times a month, while the other half indicated students either do not work on portfolios at all or do so only a few times a trimester.

Classroom observation data also support this key finding. Observed classrooms exhibited a range in the presence of instructional activities supportive of a rigorous learning environment, including activities related to content understanding, analysis and problem solving, and quality of feedback. Evidence of these activities was inconsistent within and across classrooms. In the majority of classrooms, discussions sometimes focused on organizing ideas or essential attributes, but the discussion may have been limited or also focused on isolated, discrete facts. Limited connections between the material and life outside of school were made, and student misconceptions were not always addressed effectively. Data indicate that opportunities to engage in higher-order thinking such as analysis, problem solving, reasoning, and creation were present to a great extent in a few classrooms, but in the majority of classrooms evidence was inconsistent or fleeting. Evidence of quality feedback provided to students also was observed to be inconsistent across classrooms. Occasional feedback loops were present, and students were only sometimes encouraged to explain or extend their responses to questions.

### **CRITICAL KEY FINDING 2:**

**While documents indicate that the intake process allows staff to collect information for student placements, there is a lack of formal orientation for incoming students.**

Critical Key Finding 2 is supported by information from interviews and a review of documents. Interview data indicated that the school has a consistent and structured intake process for new students. Information and data about incoming students is collected, including: transcripts, attendance history, individualized education programs (IEPs), and disciplinary

records when the data are available. Incoming students also are interviewed by staff to review student credit accumulation and family, social, and behavioral history, and to identify services that may be beneficial to them. Students also are given assessments in reading comprehension and vocabulary. Co-interpretation participants explained that while the collected data are available to school staff, there is not a formalized process for using the data in an ongoing manner, although interviewees stated that the data on incoming students are used to make placement decisions. It also was acknowledged by co-interpretation participants that students admitted in the second and third trimesters do not benefit from the orientation activities and community building exercises that occur at the start of the school year.

### **CRITICAL KEY FINDING 3:**

**There is an inconsistency in teachers incorporating student ideas, leadership roles, and responsibilities in the classroom.**

Critical Key Finding 3 is supported by classroom observations. Co-interpretation participants noted that across classrooms there were inconsistent opportunities for student leadership, choice, and meaningful peer interactions as well as mixed levels of encouragement for student ideas and opinions. In a few classrooms, such opportunities were evident throughout the observation and involved most or all of the students. However in the majority of observed classrooms, teachers primarily presented information, and some connections were made to the student's academic lives but not to their personal lives or interests. At times, teachers encouraged student ideas and opinions, but then did not integrate them into the classroom discussion. Peer interactions were sometimes present but limited in duration, and generally student choice was not observed.

## **Positive Key Findings**

### **POSITIVE KEY FINDING 1:**

**There are many ways in which student engagement is addressed, including use of social networking, special services, attention to attendance, and an overall climate of respect.**

Positive Key Finding 1 is supported by interviews, documents, observations, and survey data. Observation data indicated that the majority of classrooms had consistent student engagement in which the majority of students in the class are focused and participating in the learning activity presented or facilitated by the teacher. Survey data noted that the majority of teachers reported that students often or always show each other respect, build on each other's ideas, provide constructive feedback, and participate in discussions. Observation data also indicated that respect, an indicator of positive climate, was consistently present in observed classrooms. Interview data noted that the school has an attendance committee to review attendance and determine supports or interventions that students may need.

Interviewees described efforts to maintain student engagement through daily attendance monitoring and an attendance committee that meets weekly to review student data and determine what supports or interventions students may need. Advocate counselors are based in the school and employed by Jewish Child Care Association. They make phone calls, conduct home visits, and may arrange for transportation for students. Documents further illustrated

that the school employs multiple strategies to reach out to students and alumni via cell phone, email, texting, Twitter, and Facebook.

**POSITIVE KEY FINDING 2:**

There is evidence of a schoolwide culture of open dialogue and communication regarding student needs, student progress, and staff collaboration.

Positive Key Finding 2 is supported by information from interviews, documents, and survey data. Data from surveys noted that most teachers were comfortable sharing concerns about a student they have identified as in need of academic support with other teachers (78.6 percent) and with the administrators (92.9 percent). Survey data also indicated that nearly all of the teachers agree or strongly agree that teachers in the school talk with each other about student needs and goals. Interview and survey data indicated that teachers meet both formally and informally to collaborate on instruction and student learning and to learn strategies for working with students with special needs from counselors and special education providers.

**POSITIVE KEY FINDING 3:**

According to documents, the English language arts (ELA) department has developed a sequence of courses and the school is planning to do so in other subjects over the summer.

Positive Key Finding 3 is supported by information from documents submitted by Brooklyn Democracy Academy and from interviews. The school provided two English language arts curriculum maps, which included Common Core standards, essential questions, skills, topics, multimedia materials, and strategies for differentiation. In addition, a document was provided that outlines a scope and sequence of ELA classes provided at the school. Participants at co-interpretation further noted that summer curriculum planning sessions will include efforts to similarly define a scope and sequence for math. Interviewees explained that baseline assessments for incoming students have been developed for ELA, and teachers are planning to do so for math as well.

Documents indicated that a school goal was for teachers to create and submit weekly outlines, including specific learning objectives and daily assessments. Teachers also are expected to create biweekly assessments to reflect content and skill objectives and incorporate higher-order thinking skills.

# Recommendations

## Overview of Recommendations

Brooklyn Democracy Academy has many strengths from which to draw upon to address the prioritized areas for improvement. Data collected during the audit process point to a collegial environment in which staff and faculty share concerns about students and an overall atmosphere of respect. This contributes to a safe and orderly environment that conveys warmth and concern for students. Further, in recognition of its unique student population, the school strives to identify needs and provide students with academic, social, and behavioral supports to maintain student engagement and progression toward graduation. The support for collaboration among instructors, advocate counselors, and administrators provides opportunities to share successful strategies and to draw on the collective expertise of the staff. These qualities will contribute to the success of improvement efforts.

Co-interpretation participants highlighted instructional issues and the use of student data as priority areas for improvement. Given the stated focus in the 2010–11 Comprehensive Education Plan, the recommendations made in this report likely complement existing improvement efforts. For example, rigorous courses that develop higher-order thinking is a stated aim. Yet the data suggest there is inconsistent use of strategies that promote such skills. Therefore, alongside the recommendations, the school is encouraged to consider the stages of implementation (see page 7) to determine where current practices fall, and to identify steps to deepen implementation and ensure consistent use of instructional strategies.

## THE FOUR RECOMMENDATIONS

With these issues in mind, Learning Point Associates auditors developed the following four recommendations:

1. Implement instructional strategies that increase opportunities for higher-order thinking, analysis and problem solving, and deeper content understanding.
2. Implement instructional strategies that encourage high-quality instructional feedback between the teacher and students or among students.
3. Develop and implement specific strategies for incorporating appropriate student voice, choice, and opportunities for autonomy and leadership in the classroom
4. implement clear policies, regulations, and feedback loops within the school to determine how students are identified for interventions and supports, and measure student progress.

Each recommendation provides a review of research, online resources for additional information, specific actions that the school may wish to take during its implementation process, and examples of real-life schools that have successfully implemented strategies. All works cited appear in the References section at the end of this report. Please note that the order in which these recommendations are presented does not reflect a ranking or prioritization of the recommendations.

## Stages of Implementation

Implementation is a process, not an event. Research suggests that full implementation can take several years. A meta-analysis of cross-industry program implementation studies identifies the following stages of the implementation process:

**Exploration and adoption.** This stage is about awareness and acquisition of knowledge about a practice or program. “The purpose of exploration is to assess the potential match between community needs, evidence-based practice and program needs, and community resources and to make a decision to proceed (or not)” (Fixsen, Naoom, Blase, Friedman, & Wallace, 2005, p. 15). This stage also may include an examination of readiness to act and preparation of the organization and staff.

**Program installation.** This stage is about considering the needed elements to support a new program or practice. The innovation may require that operating norms are changed. Leaders will want to consider structural supports, including funding, human resources, policies, and frameworks for reporting and outcome expectations. Consideration of additional supports or changes to structures are needed to support effective implementation.

**Initial implementation:** Fixsen et al. (2005) write, “During the initial stage of implementation the compelling forces of fear of change, inertia, and investment in the status quo combine with the inherently difficult and complex work of implementing something new” (p. 16). The unwavering support of leaders is crucial at this stage, as it is at this point that practitioners can become overwhelmed with new expectations layered on top of existing demands and cease their attempts at implementation.

**Full operation.** This stage can be defined as when “new learning becomes integrated into practitioner, organizational, and community practices, policies, and procedures (Fixsen et al., p. 16). Over time, the innovation becomes the normal operating procedure and the structural supports, systems, and policies are aligned to the new way of working and communicating. It is at this stage that practitioners can expect to observe the beneficial outcomes of the new practice or program.

**Innovation.** The unique communities, needs, and circumstances of organizations may require that modifications are needed to realize the greatest impact of a newly introduced program or practice. However, some changes may actually be considered “program drift or threats to fidelity” (Fixsen et al., p. 17). This can be avoided by first implementing the program or practice with fidelity and then developing modifications. It was noted that programs taking this approach to adapting programs were more successful than those that did not move through full operation (Fixsen et al., p. 17)

**Sustainability.** This aspect of implementation is important to consider throughout each stage to ensure long-term survival of the program or practices. A myriad of potential changes in staff, leadership, funding streams, or shifting priorities and politics can derail implementation efforts. School leaders, staff, and stakeholders will want to maintain awareness of potential changes and their subsequent impact on implementation and sustainability.

## Recommendation 1: Instructional Rigor

**Implement instructional strategies that increase opportunities for higher-order thinking, analysis and problem solving, and deeper content understanding.**

This recommendation addresses Critical Key Finding 1 which found that opportunities for students to engage in higher-order thinking, problem solving, and analysis were present, but not consistent within and across classrooms. The school acknowledges in the 2010–11 Comprehensive Educational Plan (CEP) that many students who enroll come to the school with significant skill deficits. While there are structures and supports to assist struggling students, skill building should not forsake academically challenging and rigorous material. Finally, an overall climate of support and a focus on student engagement articulated in Positive Key Finding 1 will serve to support the success of this recommendation.

### LINK TO RESEARCH

Instruction that pushes students to engage in higher-level thinking leads to deeper learning for students (Marzano, Pickering, & Pollock, 2001; Newmann, Bryk, & Nagaoka, 2001; Pashler et al., 2007). Too often, particularly in schools where students are struggling, instruction focuses on lower-level thinking skills, basic content, and test preparation. Teachers of struggling student groups or tracks usually offer students “less exciting instruction, less emphasis on meaning and conceptualization, and more rote drill and practice activities” than do teachers of high-performing or heterogeneous groups and classes (Cotton, 1989, p. 8). Yet this focus on basic skills does not necessarily improve student achievement.

Several research studies were completed from 1990 to 2003 “which demonstrated that students who experienced higher levels of authentic instruction and assessment showed higher achievement than students who experienced lower levels of authentic instruction and assessment” (Newmann, King, & Carmichael, 2007, p. vii). These results included higher achievement on standardized tests (Newmann et al., 2001). It also is important to note that these results “were consistent for Grades 3–12, across different subject areas (mathematics, social studies, language arts, science), and for different students regardless of race, gender, or socioeconomic status” (Newmann et al., 2007, p. vii).

Teachers need to provide structured opportunities and time for students to take on higher level cognitive work (Tomlinson, 2003). In discussing the *gradual release of responsibility model*, Fisher and Frey (2008) state that “the cognitive load should shift slowly and purposefully from teacher-as-model, to joint responsibility, to independent practice and application by the learner” (p. 2). This process allows students to become what Graves and Fitzgerald (2003) call “competent, independent learners” (p. 98).

There are several steps to ensure that students are being asked to complete this type of intellectually challenging work, which increases test scores and improves performance on authentic assessment measures as well. Newmann et al. (2001) define *authentically challenging intellectual work* as the “construction of knowledge, through the use of disciplined inquiry, to produce discourse, products, or performances that have value beyond school” (p. 14).

Daggett (2005) agrees, stating that all students should be pushed “to achieve academic excellence, which ultimately boils down to applying rigorous knowledge to unpredictable,

### QUICK LINKS: Online Sources for More Information

Doing What Works: Providing  
Research-Based Education  
Practices Online (Website)

<http://dww.ed.gov/>

*Organizing Instruction and  
Study to Improve Learning*  
(Publication)

[http://ies.ed.gov/  
ncee/wwc/pdf/  
practiceguides/20072004.  
pdf](http://ies.ed.gov/ncee/wwc/pdf/practiceguides/20072004.pdf)

real-world situations, such as those that drive our rapidly changing world” (p. 5). Disciplined inquiry, which occurs in the classroom, requires that students “(1) use a prior knowledge base; (2) strive for in-depth understanding rather than superficial awareness; and (3) express their ideas and findings with elaborated communication” (Newmann et al., 2001, p. 15).

## IMPLEMENTATION CONSIDERATIONS

### 1. Cultivate schoolwide high expectations for students.

- Align instruction with the New York State P–12 Common Core Learning Standards. According to NYCDOE (2011), schools in New York City are set to have fully adopted the P–12 Common Core Learning Standards for students to take aligned assessments during the 2014–15 school year. These standards are internationally benchmarked and rigorous; they clearly explain what students at each grade level are expected to know and be able to do. Some schools were involved in pilot programs in 2010–11.
- Develop a shared understanding of instructional rigor through collaborative curriculum planning, design, and/or redesign. When developing or revising curriculum maps, identify opportunities for formative assessment tasks that encourage higher-level thinking for each unit of study.
- Through teacher collaboration, develop common student assignments that ask students to perform rigorous and authentic tasks.
- Through teacher collaboration, develop common student assessments that include rigorous and authentic summative assessment tasks.
- Monitor implementation of expectations through classroom observations, lesson plan review, and student achievement results on common formative assessments.

### 2. Provide professional development for teachers on instructional strategies that push students to engage in higher-order thinking.

- Provide ongoing professional development for teachers that describes the importance of pushing students to do higher-level thinking and provides strategies for how to do so. This training may be provided through ongoing professional development sessions and/or support of an instructional coach.
- Create clear expectations regarding how teachers should implement this professional development in the classroom (e.g., one strategy utilized each day as reflected in lesson plans, authentic assessments at the end of each unit).
- Identify how this professional development can be incorporated into scheduled teacher collaboration sessions.
- Monitor implementation of professional development through classroom observations, lesson plan review, and student achievement results on common formative assessments.

### 3. Develop examples of authentic intellectual work.

The following example can be used to help school leaders and teachers understand what authentic intellectual work might look like.

## Examples of High-Scoring and Low-Scoring Measures of Authentic Intellectual Work

The research report *Improving Chicago's Schools: Authentic Intellectual Work and Standardized Tests: Conflict or Coexistence?* provides examples of two sixth-grade writing assignments: one that scored high and one that scored low on measures of authentic intellectual work. The authors conclude each example with a commentary of why the assignment received the score that it did.

### High Scoring Writing Assignment

Write a paper persuading someone to do something. Pick any topic that you feel strongly about, convince the reader to agree with your belief, and convince the reader to take a specific action on this belief.

### Commentary

*In this high scoring assignment, demands for construction of knowledge are evident because students have to select information and organize it into convincing arguments. By asking students to convince others to believe and act in a certain way, the task entails strong demands that the students support their views with reasons or other evidence, which calls for elaborated written communication. Finally, the intellectual challenge is connected to students' lives because they are to write on something they consider to be personally important.*

### Low Scoring Writing Assignment

Identify the parts of speech of each underlined word below. All eight parts of speech—nouns, pronouns, verbs, adjectives, adverbs, prepositions, conjunctions, and interjections—are included in this exercise.

1. My room is arranged for comfort and efficiency.
2. As you enter, you will find a wooden table on the left.
3. I write and type.
4. There is a book shelf near the table.
5. On this book shelf, I keep both my pencils and paper supplies.
6. I spend many hours in this room.
7. I often read or write there during the evening...

### Commentary

*This assignment requires no construction of knowledge or elaborated communication, and does not pose a question or problem clearly connected to students' lives. Instead it asks students to recall one-word responses, based on memorization or definitions of parts of speech.*

Reprinted from page 24 of *Improving Chicago's Schools: Authentic Intellectual Work and Standardized Tests: Conflict or Coexistence?* by Fred M. Newmann, Anthony S. Bryk, and Jenny K. Nagaoka. Available online at <http://ccsr.uchicago.edu/publications/p0a02.pdf>. Copyright © 2001 Consortium on Chicago School Research. Reprinted with permission.

Further examples of authentic intellectual instruction, teachers' assignments, and student work can be found in the following source:

Newmann, F. M., King, M. B., & Carmichael, D. L. (2007). *Authentic instruction and assessment: Common standards for rigor and relevance in teaching academic subjects*. Des Moines, IA: Iowa Department of Education. Retrieved July 18, 2011, from <http://centerforaiw.com/sites/centerforaiw.com/files/Authentic-Instruction-Assessment-BlueBook.pdf>

## **Perrysburg High School**

**Perrysburg High School in Perrysburg, Ohio serves students in Grades 9–12. Perrysburg is a suburb of Toledo, Ohio.**

Perrysburg is the sole high school in the Perrysburg Exempted Village District in Wood County. Nate Ash teaches physics to eleventh and twelfth graders. Ash has taught professional development programs at the Northwest Ohio Center of Excellence in Science and Mathematics Education, and at Bowling Green State University in Ohio. He acts as a mentor to new science teachers.

Ash teaches physics using an inquiry approach. Students do lab activities and solve problems together to understand key concepts in physics. In each lesson he poses higher-order questions to help his students build explanations: How do you know that? What would happen if we changed this variable? How is this similar or different? Ash uses whiteboards in a number of ways: for group problem solving, representing a phenomenon with pictures, and student presentations.

Each new unit/topic is introduced with a hands-on activity. Ash presents a physical situation to students, has them manipulate the variables, and then narrows down their list of variables to design an experiment. Every experiment is introduced with an open-ended question (What would happen if...? What happens when...?). Students work in small groups to describe what happens with graphs, pictures, mathematical equations, and written expression. When they are finished, students present their work to the class in “whiteboard sessions.”

Ash explains how the whiteboard sessions give important insights into student thinking: “We can really see if the students understand on every different level how that problem works or how that situation works. And if there is a disjoint between any of those representations, that gives us someplace to go, that gives us something to talk about, something to work through.”

Students appreciate being in charge of their own learning, having the opportunity to challenge their peers, and develop critical thinking skills as they explain their ideas in front of a group. As Ash says, “Students really like this approach because, instead of just giving them the answer, it gives them a chance to explain to each other what’s going on. And I like it because all the times that I have done physics problems on the board and gone through the answers, I got pretty good at doing physics problems but my students never got any better at all.”

Ash has found that with this approach his students are no longer trying to find equations that fit the problems, but working to develop a deep understanding of the underlying concepts.

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Description from *Doing What Works* website: [http://dww.ed.gov/media/CL/OIS/TopicLevel/case\\_perrysburg\\_52708rev.pdf](http://dww.ed.gov/media/CL/OIS/TopicLevel/case_perrysburg_52708rev.pdf)

**QUICK LINKS:**  
**Online Sources  
for More Information**

*Organizing Instruction and Study to Improve Student Learning* (Publication)

<http://ies.ed.gov/ncee/wwc/pdf/practiceguides/20072004.pdf>

Northwest Regional Educational Laboratory: *Focus on Effectiveness* (Webpage)

<http://www.netc.org/focus/strategies/>

Doing What Works: *How to Organize Your Teaching* (Webpage)

[http://dww.ed.gov/How-to-Organize-Your-Teaching/Higher-Order-Questions/see/?T\\_ID=19&P\\_ID=43](http://dww.ed.gov/How-to-Organize-Your-Teaching/Higher-Order-Questions/see/?T_ID=19&P_ID=43)

Doing What Works: *Essential Questions* (Webpage)

[http://dww.ed.gov/launcher.cfm?media/CL/OIS/HQ/See/584\\_hq\\_mats\\_essential\\_questions.pdf](http://dww.ed.gov/launcher.cfm?media/CL/OIS/HQ/See/584_hq_mats_essential_questions.pdf)

Doing What Works: *Using Higher Order Questions to Encourage Explanations* (Webpage)

[http://dww.ed.gov/launcher.cfm?media/CL/OIS/HQ/See/585\\_hq\\_mats\\_student\\_explanation-1.pdf](http://dww.ed.gov/launcher.cfm?media/CL/OIS/HQ/See/585_hq_mats_student_explanation-1.pdf)

What Works: Socratic Seminar Planning Form (Lesson Plan)

[http://dww.ed.gov/launcher.cfm?media/CL/OIS/HQ/See/583\\_hq\\_mats\\_seminars.pdf](http://dww.ed.gov/launcher.cfm?media/CL/OIS/HQ/See/583_hq_mats_seminars.pdf)

## Recommendation 2: Instructional Feedback

**Implement instructional strategies that encourage high-quality instructional feedback between the teacher and students or among students.**

This recommendation addresses Critical Key Finding 1, which found that continuous and on-going feedback loops between teachers and students were not present consistently and the feedback did not always expand or clarify student understanding. Yet, the 2010–11 CEP describes providing constant feedback to students on performance and assessments to be a key strategy for supporting achievement. Still, the support for teacher collaboration and the assistance of an instructional support coach will provide ongoing support for the continued implementation of strategies described in this recommendation.

### LINK TO RESEARCH

A meta-analysis of research conducted on instructional feedback, found feedback to be one of the most powerful influences on learning and achievement (Hattie & Timperly, 2007). In *The Power of Feedback*, these authors note that “Feedback can be conceptualized as information provided by an agent (e.g., teacher, peer, book, parent, self, experience) regarding aspects of one’s performance or understanding.”

Many teachers spend a considerable proportion of their instructional time in whole-class discussions or question-and-answer sessions, but these sessions tend to rehearse existing knowledge rather than create new knowledge for students. Furthermore, teachers generally listen for the *correct* answer instead of listening for what they can learn about the students’ thinking (Davis, 1997).

Research indicates that (a) telling students that answers are right or wrong has a negative effect on achievement; (b) providing students with correct answers has a moderate effect; (c) explaining what is correct and what is not correct has a greater effect. (Marzano, Pickering, & Pollock, 2001).

According to the Classroom Assessment Scoring System–Secondary Manual, when properly implemented, instructional feedback “expands and extends learning and understanding and encourages student participation” (Pianta, Hamre, Haynes, Mintz, & La Paro, 2007, p. 49). Feedback needs to provide information specifically relating to the task or process of learning that fills a gap between what is understood and what is aimed to be understood (Sadler, 1989). Feedback itself can “take on the form of new instruction, rather than informing the students solely about correctness” (Kulhavy, 1977, p. 212). Through feedback, teachers provide students with opportunities to obtain a deeper understanding of material and concepts through back and forth exchanges called *feedback loops*, and by providing additional information, opportunities to explain their thinking and rationale for response and actions, opportunities to perform at higher levels than they would be able to perform independently through scaffolding, and increases in student involvement and persistence through encouragement and affirmation (Pianta et al., 2007, p. 49).

There are many ways in which teachers can deliver feedback to students and for students to receive feedback from teachers, peers, and other sources. For students, it means gaining information about how and what they understand and misunderstand, finding directions and

strategies that they must take to improve, and seeking assistance to understand the goals of the learning (Bangert-Drowns, Kulik, Kulik, & Morgan, 1991).

### Good Feedback

- Clear and unambiguous
- Specific
- Supportive, formative and developmental
- Timely
- Understood

## IMPLEMENTATION CONSIDERATIONS

### 1. Provide teachers with ongoing professional development opportunities to learn to respond effectively during whole class discussions and when providing feedback to individual students and small groups.

- **Workshops.** Identify workshops and other professional learning opportunities for teachers to learn the value of feedback. Focus professional development on building opportunities for student explanations in the classroom.
- **Peer Observations.** Support teacher collaboration by giving them tools designed to help them reflect on peer practice. Observations should focus on the use of questioning and feedback in classroom discussions and give each other feedback on the questions they ask and the kinds of student responses generated.
- **Discuss classroom examples.** Provide examples for teachers to discuss how they help students to make their thinking visible and get feedback on their explanations. Discuss the strengths and weakness of instructional approaches used to encourage explanations.

### 2. Provide opportunities for teachers to incorporate instructional strategies that facilitate high-quality feedback into curriculum documents and lesson plans.

Follow these recommendations from The Teaching Center (2009):

- **Include notes of when they will pause to ask and answer questions.** Asking questions throughout the class will not only make the class more interactive, but also will help teachers measure and improve student learning.
- **Ask a mix of different types of questions.** Use *closed* questions, or questions that have a limited number of correct answers, to test student comprehension and retention of important information. Also ask managerial questions to ensure, for example, that your students understand an assignment or have access to necessary materials. *Open* questions, which prompt multiple and sometimes conflicting answers, are often the most effective in encouraging discussion and active learning in the classroom.
- **Wait for students to think and formulate responses.** Waiting 5-10 seconds will increase the number of students who volunteer to answer and will lead to longer, more complex answers. If students do not volunteer before five seconds have

passed, teachers should refrain from answering their own question, which will only communicate to students that if they do not answer, teachers will do their thinking for them. If the students are unable to answer after sufficient time for thinking has passed, rephrase the question.

- **Do not interrupt student answers.** Often, teachers find themselves wanting to interrupt because they think they know what the student is going to say, or simply because they are passionate about the material. Teachers should resist this temptation. Hearing the students' full responses will allow them to give them credit for their ideas and to determine when they have not yet understood the material.
- **Show interest in student answers, whether right or wrong.** Teachers should encourage students when they are offering answers by nodding, looking at them, and using facial expressions that show they are listening and engaged.
- **Develop responses that keep students thinking.** For example, ask the rest of the class to respond to an idea that one student has just presented, or ask the student who answered to explain the thinking that led to the answer.
- **If a student gives an incorrect or weak answer, point out what is incorrect or weak about the answer, but ask a follow-up question that will lead that student, and the class, to the correct—or a stronger—answer.** For example, note that the student's answer overlooks the most important conclusion of the topic being discussed; then ask that same student to try to recall what that conclusion is. If the student does not recall the conclusion, open the question up to the class.
- **Follow a yes-or-no question with an additional question.** For example, follow up by asking students to explain why they answered the way they did, to provide evidence or an example, or to respond to a yes-or-no answer given by another student. It is insufficient and shortsighted to rely on quick, right answers as indications of student knowledge of subject matter. Probe student thinking when they respond. Ask: "Why do you think that? Why does that make sense? Convince us. Prove it. Does anyone have a different way to think about the problem? Does anyone have another explanation?"

## Using Instructional Feedback to Promote Learning

In February 2010, The Bill & Melinda Gates Foundation issued a report, *Small High Schools at Work: A Case Study of Six Gates-Funded Schools in New York City*, a case study of six public high schools. Guided by the research literature on effective school (and instructional) practices, the report documents evidence and examples of high-quality instruction that promotes student learning and engages students in a deep understanding of material such as metacognitive skill-building, frequent assessment and feedback, and quality questioning techniques. Danielson's (2007) framework for teaching identifies the quality of teacher questions as one component of rigorous instruction. Students must be encouraged to both ask and answer challenging questions. These questions should require students to justify their arguments and responses, pressing for clarification and explanations when needed (Fancsali et al., 2010).

### QUALITY QUESTIONING TECHNIQUES AND FEEDBACK LOOPS

An 11th grade social studies class at School 6 was studying the Progressive Era. Following an introduction to relevant vocabulary, students analyzed a political cartoon in which the lion tamer represented President Theodore Roosevelt. The teacher posed several questions about the cartoon to the whole class. In the following example, the teacher frequently probed students and asked students to elaborate on their answers by providing specific examples. The responses elicited debate as to whether the President would be able to control the trusts or not.

“What might President Roosevelt’s personality be like based on what you see in the cartoon?”

“Does the cartoonist seem to believe that President Roosevelt will be able to control the trusts?”

“Why do you think this?”

### MODELING COMPLEX THINKING AND PROCESSING

Teachers model complex thinking by demonstrating the process and steps they use to analyze and synthesize information and to solve problems.

A 10th grade English teacher at School 3 verbalized her thought process on a reading-response assignment she had given: “Ask a question of your text and explain your thought process.” The question the teacher asked of *Catcher in the Rye* was, “Will Holden ever be happy?” She explained, “My thought process was, I am wondering this because he seems totally depressed and has no goals or hope.” Later in the period, the teacher modeled inference making. As she read aloud from the text, she stopped to point out when she was making an inference: “I’m going to model what inference is, because we are working on finding quotes to support our statements. I’m going to infer that Holden is sweaty because he is nervous.... I’m going to infer that Holden is good at heart; he gives the benefit of the doubt. You can point to these lines [in the book] as evidence.”

### ENCOURAGING METACOGNITION

Metacognitive skills include noticing when one doesn’t understand something and taking steps to remedy the situation, and formulating questions.

In an 11th–12th grade mathematics class at School 3, the teacher encouraged students to make internal thought processes overt: “How did you solve this equation?” “Does anyone else have another way to solve the equation?”

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Adapted from pages 50–57 of *Small High Schools at Work: A Case Study of Six Gates-Funded Schools in New York City*, by Cheri Fancsali, Reva Jaffe-Walter, Vernay Mitchell-McKnight, Nancy Nevarez, Eliana Orellana, and Lea Williams Rose. Available online at <http://www.aed.org/Publications/loader.cfm?url=/commonspot/security/getfile.cfm&pageid=35987>. This report was published in 2010 by The Academy for Educational Development.

## Recommendation 3: Student Voice, Choice, Autonomy and Leadership

### Develop and implement specific strategies for incorporating appropriate student voice, choice, and opportunities for autonomy and leadership in the classroom

This recommendation addresses Critical Key Finding 3, which found inconsistent presence of opportunities for student leadership, choice, shared responsibilities, and structures for meaningful peer interactions. This is counter to aims stated in the school's 2010–11 CEP which indicates the school is working to implement the workshop model of instruction, although the CEP does convey value for student input in that the plan articulates action steps for collecting survey data from students to inform improvement plans in the coming year. The school is encouraged to build on this foundation and consider how efforts to incorporate student voice, choice, autonomy, and leadership can be deepened.

#### QUICK LINKS: Online Sources for More Information

Collaborative for Academic,  
Social and Emotional  
Learning (Website)  
<http://casel.org/>

Self-Determination Theory  
(Website)  
<http://www.sustainengagement.com/>

Classroom Observation:  
Student Autonomy (Website)  
[http://www1.teachertube.com/viewVideo.php?title=Classroom\\_Observation\\_\\_Student\\_Autonomy&video\\_id=185325](http://www1.teachertube.com/viewVideo.php?title=Classroom_Observation__Student_Autonomy&video_id=185325)

#### LINK TO RESEARCH

Empirical research has demonstrated that supporting student choice, autonomy, and leadership in the classroom can train students to regulate their own learning and deepen their cognitive process to improve academic achievement. Efforts to foster supportive autonomy consist of establishing a link between students' classroom behavior and the resources that motivate them to succeed, such as personal interests, goals, and values (Reeve, 2010). This approach inherently involves students in their own learning process by creating a direct link between their personal motivations and classroom activities.

Autonomy-supportive instructional strategies have been shown to improve student engagement, conceptual understanding, academic achievement, and persistence in the classroom (Young, 2005). The goal of these strategies is to encourage students to engage in self-regulated learning, which involves interpreting learning tasks, determining goals, and implementing strategies to meet goals (Young, 2005). Creating an autonomy-supportive classroom environment requires teachers to incorporate students' preferences, choices, curiosity, and challenges into lessons (Reeve, Jang, Carrell, Barch, & Jeon, 2004). Additional approaches include allocating time in a way that allows students to work in their own way, scaffolding student learning, engaging in feedback loops with students, as well as offering praise and encouragement to students (Young, 2005).

Enhancing student autonomy through autonomy-supportive strategies and lesson content that has relevance to adolescent lives allows students to align their inner motivational resources, classroom behavior, and academic achievement (Assor, Kaplan & Roth, 2002; Stefanou et al., 2004; Young, 2005). This strategy encourages students to understand schoolwork in the context of their own interests and goals, which has the potential to help students to develop self-regulation skills and learning strategies to facilitate their academic and professional success.

Adolescence represents a critical period during which youth struggle to take on new responsibilities and learn decision-making skills while concurrently establishing a sense of self and identity. This period also marks a stage where youth are learning to regulate their behavior and cognitive abilities, which can be facilitated by incorporating autonomy-supportive strategies in the classroom (Zimmer-Gembeck & Collins, 2003).

The key to developing and implementing an autonomy-supportive classroom is to become familiar with the strategies that both encourage and inhibit student voice, choice, autonomy and leadership. Table 1 provides an overview of the features and aspects that characterize an autonomy supportive motivating instructional style versus a controlling motivating style.

**Table 1. Defining Features of Two Types of Motivating Styles: Autonomy Supportive and Controlling**

Autonomy Supportive Motivating Style	Controlling Motivating Style
<p><b>Definition:</b> A teaching style that involves understanding and valuing the student’s perspective during instruction</p>	<p><b>Definition:</b> A teaching style that involves a teacher-centered approach to developing a class agenda and encouraging student compliance with the agenda</p>
<p><i>Key Features</i></p> <ul style="list-style-type: none"> <li>■ Encourages a student’s personal motivational resources</li> <li>■ Incorporates noncontrolling instructional language</li> <li>■ Promotes worth</li> <li>■ Acknowledges and accepts negative expressions and attitude</li> </ul>	<p><i>Key Features</i></p> <ul style="list-style-type: none"> <li>■ Dependent on external motivational sources</li> <li>■ Utilizes language that is more controlling and pressuring</li> <li>■ Assertive</li> </ul>
<p><small>Adapted from <i>Anatomy Support</i> by Johnmarshall Reeve (n.d.), available online at <a href="http://www.education.com/reference/article/autonomy-support/">http://www.education.com/reference/article/autonomy-support/</a>.</small></p>	

## IMPLEMENTATION CONSIDERATIONS

Specifically, teachers can take the following actions to promote autonomy in the classroom:

### 1. Foster relevance.

Teachers should make an overt effort to incorporate their students’ interests, values, and goals into the learning process by learning about student concerns through informal and classroom dialogue (Learning Point Associates, 2005). Examples include communicating with the students regarding their feedback about classroom tasks and trying to help them understand how the task contributes to their personal objectives (Assor et al., 2002). Research has indicated that students are more likely to be cognitively engaged and use higher-order thinking skills when they find the subject matter interesting (Young, 2005).

### 2. Make learning authentic.

Instructional practice should build upon students’ foundational knowledge (i.e., background, ideas, skills, and attitudes challenge students and also connect content to value beyond the classroom [Donovan & Bransford, 2005; Newmann, Marks, & Gamoran 1995]). Examples of activities include assigning students tasks that have public or personal value, such as oral history projects or writing editorials for the local newspaper,

and that also are academically rigorous (Newmann et al., 1995).

### **3. Provide choice.**

Teacher behavior should enable students to choose classroom activities and tasks that are consistent with their interest and goals. Providing students with the opportunity to understand how schoolwork can contribute to their personal goals increases their ability to work more autonomously (Assor et al., 2002). Additionally, asking students for input on classroom activities allows teachers to become more aware of students' psychological needs and incorporate them into the lesson (Reeve, 2010).

### **4. Promote independent thinking and permit student criticism.**

Encouraging students to engage in independent thinking and criticizing lessons that they do not find interesting can help teachers to foster more in-depth conversations about classroom activities. These discussions may allow the teacher to make adjustments to lessons to increase student interest or engage in a dialogue with students about the importance of the task to make them value the work more highly (Young, 2005). The overall goal of this strategy would be to increase the opportunities for student voices in the classroom and promote mutual communication among teachers and students regarding lesson content.

### **5. Be aware of how teacher behaviors can inhibit student voice, choice, leadership and autonomy.**

Work to eliminate the following behaviors:

- **Micromanaging student work and behavior.** Teachers should avoid unnecessary intrusions related to how students approach their work or inhibiting student expression. Students should have the opportunity to discover their natural working patterns in the context of classroom activities (Young, 2005).
- **Assigning tasks that lack relevance and interest to adolescents.** Students are less likely to be responsive to tasks that they do not find interesting or important. Thus, teachers should make an effort to communicate the importance of the tasks they assign and incorporate elements that are relevant to adolescent lives, when appropriate (Reeve, 2009; Young, 2005).
- **Forbidding student criticism and stifling independent thinking.** Teacher behavior that undermines student voice has the potential to inhibit the ability for students to develop skills related to self-regulated learning and self-expression. Inhibiting students' ability to express their opinions can be frustrating and can interfere with their ability to make connections between classroom activities and their personal interests and goals.

## Autonomy-Inducing and Autonomy-Suppressing Teacher Behaviors

### Autonomy-Inducing Teacher Behaviors:

- Listening
- Integrating independent work sessions
- Facilitating peer-to-peer conversations
- Praising and encouraging evidence of improvement or mastery
- Scaffolding
- Creating a responsive environment that supports student questions and comments
- Incorporating student perspective and experiences

### Autonomy-Suppressing Teacher Behaviors:

- Dominating learning materials
- Solving problems or answering questions before students have had a chance to work on them independently
- Directive rather than reciprocal feedback
- Interrupting student comments

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Young, M. R. (2005). The motivational effects of classroom environment in facilitating self-regulated learning. *Journal of Marketing Education*, 27(1), 25-40.

## **Student-Generated Classroom Rules**

One strategy for promoting student voice, choice, autonomy, and leadership in the classroom is to enable students to generate the rules of the classroom. Following are examples of two school districts that use student-generated classroom rules.

### **LINN BENTON LINCOLN EDUCATION SERVICE DISTRICT, EUGENE, OREGON**

In 2007, the National Center for School Engagement held a contest titled “21 Ways to Engage Students in School,” which included a sampling of best practices designed to foster student leadership in schools, community-based groups, and public agencies. Linn Benton Lincoln Education Service District in Eugene, Oregon, had a winning strategy for creating student-generated classroom rules:

In Eugene, Oregon, students create a list of classroom rules to be followed. Each student signs off on the rules and is held accountable by fellow students. In addition, they developed their own “honor role,” in which students are recognized for doing their best, following directions, and not talking out more than 3 times a day. (National Center for School Engagement, 2007, p. 4)

### **MT. PLEASANT PUBLIC SCHOOLS, MT. PLEASANT, MICHIGAN**

A teacher at Mt. Pleasant High School (see Ling, n.d.) developed a unit on creating student-generated classroom rules. The unit involves multiple examples of real-world relevance, including problem solving, democratic self-government, common good, collective rights, and public discourse.

#### **CLASSROOM ACTIVITIES:**

- Identifying students’ rights that have been recognized by the U.S. Supreme Court.
- Articulating the concept of jurisdiction in the context of classroom rules in a public school setting.
- Writing and prioritizing the most critical student rights and student behaviors that may threaten those rights.
- Developing strategies for protecting these student rights.
- Voting on a single set of rules that are appropriate for a variety of classroom settings.
- Monitoring the implementation of the rules with regard to protecting student rights and making adjustment based on majority decisions.

#### **PROPOSED UNIT ASSESSMENTS:**

- **Classroom discussion:** The ability of students to articulate key concepts orally.
- **Group work:** Determining how well students are working in groups to develop a list of rights, identify problem behaviors and create classroom conduct rules.
- **Essay:** Topics could include the relationship between rights and rules in a society, identify the most (or least) important rules that protect individual rights, propose changes to the process for developing class rules.

#### **TEACHING TIPS:**

Teachers should expect to play a role in developing rules with students and may need to generate additional “Teacher rules” to maintain a supportive and productive working environment. However, note that any teacher-generated rules should be kept at a minimum to maintain student ownership over the lesson content.

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Additional details about the specific lessons at Mt. Pleasant Public Schools are available through the Learning to Give website at <http://learningtogive.org/lessons/unit18/>.

## Recommendation 4: Progress Monitoring

**Implement clear policies, regulations, and feedback loops within the school to determine how students are identified for interventions and supports, and measure student progress.**

This recommendation addresses Critical Key Findings 2. Data collected during the audit process indicate that Brooklyn Democracy Academy has in place a number of elements associated with progress monitoring. For example, staff have developed some common assessments for ELA, and these are used to assess incoming students to determine areas of strength and weakness along with appropriate courses. The curriculum is organized to assess students on a bi-weekly basis, thus facilitating feedback and communications about student grades and performance. The school and its partnering organizations also work to provide students with needed supports and interventions. However, discussion during co-interpretation revealed that staff and faculty strive to make better use of data on incoming students. This recommendation represents the full scope of what progress monitoring may look like. The school is encouraged to determine next steps after reviewing the recommendation and reflecting on current practice with consideration of the stages of implementation described earlier in this report.

### LINKS TO RESEARCH

Progress monitoring has become a critical element in New York Schools since schools have been required to implement academic intervention services (AIS) designed to provide appropriate supports to underperforming students (see Section 100.1(g), 100.2(ee) of New York State Education Department Regulations). Schools are facing constant pressure to identify, assess, and address the needs of students who are not meeting academic standards in order to meet stringent accountability standards (Deno et al., 2009; Stecker, Lembke, & Foegen, 2008). As a result of this policy, there has been increased effort around standards-based reform in schools (Deno et al., 2009). This effort consists of developing and implementing policies and systems to identify students who are in need of academic interventions and supports as well as to monitor their progress using benchmark assessments (Stecker et al., 2008).

Research has shown that implementing student progress monitoring can result in improved student learning and achievement and can also inform instructional decisions (Cotton, 1988). A number of studies have shown that progress-monitoring tools can be used to predict outcomes related to student performance and to make data-driven decisions related to student engagement in curriculum and instruction (Mellard, McKnight, & Woods, 2009; Stecker, Fuchs, & Fuchs, 2005). Progress monitoring is commonly used in the context of response to intervention (RTI), a model of academic supports that utilizes assessments and interventions in the context of a multilevel prevention system to promote student achievement. However, progress monitoring can be used even if a school has not fully implemented an RTI framework (Mellard et al., 2009).

The primary goal of progress monitoring is to determine whether the academic intervention is having the expected result, or whether adjustment needs to be made. This concept is often referred to as using assessment to drive instruction, and it should be implemented continuously to improve instruction (Mellard et al., 2009; Hamilton et al., 2009). Thus, practitioners need to have an understanding of key assessment tools that allow them to

### QUICK LINKS: Online Sources for More Information

National Center on Student Progress Monitoring (Website)

<http://www.studentprogress.org/>

Student Progress Monitoring Resources from the Center for Instruction (Website)

[http://centerforinstruction.org/resources\\_searchresults.cfm?searchterm=progress+monitoring](http://centerforinstruction.org/resources_searchresults.cfm?searchterm=progress+monitoring)

New York State Response to Intervention Technical Assistance Center (Website)

[www.nysrti.org](http://www.nysrti.org)

“Tiered Service-Delivery Model,” National Research Center on Learning Disabilities (Website)

[www.nrclld.org](http://www.nrclld.org)

National Center on Response to Intervention (Website)

<http://www.rti4success.org>

identify students in need of intervention, monitor students' progress, and diagnose the specific academic issues facing students.

One of the most common tools for both screening and progress monitoring is curriculum-based measurement, which can be used for both general and special education (Stecker, Fuchs, & Fuchs, 2005; Deno et al., 2009). This method consists of a straightforward procedure for regularly evaluating student progress in basic academic areas. Curriculum-based measurement has been proven to provide reliable and valid measures in key academic areas such as reading, mathematics, written expression, and spelling (Deno et al., 2009). This method also is aligned with curriculum content and annual performance goals, and consists of procedures that are regularly implemented (e.g., every three weeks). Curriculum-based measurement also is a measure that is sensitive to student growth in the sense that teachers can determine a student's rate of progress (Stecker et al., 2008). Additionally, curriculum-based measurement data can be aggregated at the classroom and school level to facilitate data analysis around meeting state accountability targets (Deno, 2003).

## IMPLEMENTATION CONSIDERATIONS

### 1. Consider additional assessments in conjunction with progress monitoring.

Progress monitoring should be implemented (along with screening and diagnostic strategies) with either a small group of students or individual students (receiving targeted instruction) in order to monitor changes in academic skills for students placed into academic intervention services. Table 2 shows key guidelines to consider when implementing progress monitoring in conjunction with additional assessments.

**Table 2. Strategies for Implementing a Schoolwide Monitoring System**

	Monitoring Strategy		
	Screening	Progress Monitoring	Diagnostic Tests
<b>Target Population</b>	School level	Class or small-group level	Individual student level
<b>Uses</b>	Establish broad benchmarks	Identify specific academic or behavioral target	Identify specific academic areas related to knowledge, skills, or abilities
<b>Frequency</b>	Annually	Every three weeks/weekly	Annually
<b>Purpose</b>	Anticipate students who are at-risk	Adjust classroom assignments or student groups	Identify individual student challenges
<b>Focus</b>	School	Student class/ small group	Student
<b>Instruction</b>	Decisions related to class/school instruction and curriculum	Evaluate curriculum/ instruction intervention	Select appropriate curriculum and instructional methods
<b>Implications</b>	First step in intervention planning process	Maintain or adjust placement	Intervention preparation or specification

Adapted from Mellard, D. F., McKnight, M., & Woods, K. (2009).

## **2. Foster a data-driven culture within the school.**

Data-driven practices should be promoted in the school to make sure that teachers are engaged and supported in using data to monitor the progress of their students. Schools should implement professional development around student progress monitoring that is either curriculum based or teacher developed, such as individual or group coaching for teachers (Hamilton et al., 2009).

## **3. Implement standard measurement tasks.**

Assessments that are standardized and validated short-duration tests represent a key component of student progress monitoring. Standardization enables teachers to establish baseline data from which progress can be measured across time. Examples of standard tasks that can be measured include reading aloud from a text and selecting words deleted from the text, writing word sequences from a story starter or picture in writing, writing letter sequences from dictation in spelling, and solving problems in arithmetic (Deno, 2003). Additionally, the exams should be fast and easy to administer to avoid impacting instructional time (Stecker et al., 2008).

## **4. Use benchmarks.**

Assessments for student progress monitoring should allow teachers to compare student performance to pre-established cut scores, which serve as benchmarks to identify students as either not at-risk or at-risk (Stecker et al., 2008). Teachers should administer tests either to groups of students or to individual students at regular intervals and then compare student scores to these benchmarks as a way of determining relative risk to inform instructional decisions (Stecker et al., 2008).

## **5. Graph progress.**

Teachers can measure student progress by collecting baseline data using standardized assessments and then plotting the results of subsequent (at least once a month) assessments on a graph (McLane, 2006). Assessment as frequent as once or twice weekly may be required for students who are low achieving or who have been diagnosed with learning disabilities (Stecker et al., 2008). A goal line can be connected from the baseline (representing the current level of performance) to the annual goal line to show the optimal rate of progress required to meet long-term academic achievement goals (Stecker et al., 2008).

### **Student Progress Monitoring Summarized in Five Steps**

1. Select measurement materials.
2. Evaluate validity and reliability of assessments.
3. Administer and score measures.
4. Integrate results into goal setting.
5. Evaluate instructional efficacy.

Stecker, P. M., Lembke, E. S., & Foegen, A. (2008). Using progress-monitoring data to improve instructional decision making. *Preventing School Failure, 52*(2), 48-58.

## **MacArthur Ninth Grade School**

**MacArthur Ninth Grade School serves Grade 9–12 students. Located in suburban Houston, Texas, 79 percent of students are eligible for free or reduced price lunch.**

The school regularly administers three-week and six-week assessments to check students' mastery of the objectives. Teachers analyze these data for trends and provide tutorial sessions to individual students to ensure that they can demonstrate mastery. Students also monitor their own data and set learning goals after each six-week benchmark assessment.

For the three-week assessments, teachers develop a test that typically includes 12-15 multiple-choice questions based on district benchmark assessments. The results help teachers plan instruction and provide interim feedback to students.

The six-week assessments are the districtwide benchmark tests that contain 15 questions.

Teachers typically add additional items to ensure a minimum of four questions about each objective. After assessments are scanned and scored, teachers return the results to the students.

The students count their errors per objective, determine and record their percentages, and set personal goals for the next assessment.

To analyze these results, teachers enter them in a spreadsheet that was created by the testing coordinator. To determine whether the results of an individual teacher align with the average in the department, teachers meet by department and compare the passing percent of each class with the average in the department. Then teachers reflect on the results to determine (a) areas of instruction that need to be strengthened, and (b) specific objectives that should be retaught for a whole class period or revisited through daily warm-up activities.

The district has established a 70 percent mastery goal for the six-week benchmark assessments.

Students who do not meet this goal participate in after-school tutorial sessions. Each core subject has one day set aside for these sessions. Students receiving this additional support are retested until they achieve the benchmark goal.

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(Description from the Doing What Works website: [http://dww.ed.gov/media/DDI/DDDM/TopicLevel/case\\_macarthur\\_revised.pdf](http://dww.ed.gov/media/DDI/DDDM/TopicLevel/case_macarthur_revised.pdf))

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