Tools for Reform
How a Failing District Used Data to Elevate Student Learning

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ATI
Assessment Technology Incorporated
ati-online.com
How can teachers use student assessment data to improve student learning and target their individual needs? At the Creighton School District in Phoenix, Arizona, educators wanted an assessment system that could guide teachers to make the best instructional decisions for each child. There was urgency for the task: In 2008, the Arizona Department of Education had designated Creighton as a failing district, slated for state takeover. Six of its nine schools had been labeled “Underperforming” and one as “Failing to Meet Academic Standards.”

As a high poverty, inner city, elementary and middle school district, Creighton faced an enormous challenge. So in 2008, it launched a reform initiative that led to a remarkable turnaround: Today, eight of its schools have been relabeled “Performing Plus” and one is “Highly Performing,” based on Arizona Learns achievement profiles. Creighton is no longer a failing district. How did Creighton achieve this dramatic improvement? A key ingredient for their success, say district leaders, was changing how they assessed students and, more importantly, how they analyzed results to fine-tune instruction. “This district,” says Dr. Lynne Spiller, Creighton’s Director of Research and Evaluation, “believes profoundly that there is no reason to assess a child if you are not going to use the data to determine the best instructional decisions for that child.”

Integrating assessment with instruction and curriculum was a cornerstone of the district’s reform plan. Creighton wanted to build a system that gave classroom teachers immediate data—not just a test score but assessments that were diagnostic, showing student misconceptions about learning objectives and how to address them. The system was developed in partnership with WestEd, a nonprofit research and service agency, and Assessment Technology Incorporated (ATI), whose Galileo K-12 Online Instructional Improvement System (IIS) provided a powerful and innovative technological component for the reform effort. Dr. Jason Feld, Vice President of Corporate Projects at ATI, describes Galileo as a comprehensive set of assessment, reporting, instructional, and intervention tools “designed to support educator goals to elevate student learning.” These tools, he adds, are research-based, reliable, and aligned to both state standards and the new Common Core State Standards.

For its part, WestEd provided district site and school site staff with a full menu of ongoing professional development and technical assistance focused on improving instruction, curriculum, and assessment systems in Creighton. WestEd and ATI drew on their shared expertise and experience as partners, working with other districts and schools on successful reform efforts. The marriage of intensive, high-level professional development and sophisticated but user-friendly assessment tools has helped Creighton sustain their reform effort (see table 1 below).

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1 ATI began developing Galileo assessment technology in Arizona and currently provides Galileo to pre-K programs, K-12 districts, and charter schools in 35 states. In Arizona, they currently partner with 182 K-12 districts and charter schools.

2 The multi-year initiative is funded by the Ellis Center for Educational Excellence, a Phoenix-based philanthropy focused on improving inner city, high poverty districts such as Creighton.

3 Their collaborations include work with the Mesquite Elementary School, one of three schools recognized by the state of Arizona for the Best Practices as part of the Spotlight on School Success for 2004-2005. It was designated an A+ school by the Arizona Educational Foundation in 2005. Its principal, Connie Erickson, was named a National Distinguished Principal of the Year, and student achievement on AIMS (Arizona’s Instrument to Measure Standards) increased substantially in a two-year period in three testing areas (Math, Reading, and Writing). See Overcoming Growing Pains: Arizona Elementary School Achieves Excellence in Record Time (ATI, n.d.)
Prior to the reform initiative, says Spiller, the district had relied solely on blueprint assessments: “They gave us an idea each quarter how students were progressing on the grade level standards and allowed us to forecast whether they would master them by the end of the year.” While predictive of students’ risk levels on a long-cycle for their performance on state tests, the blueprint assessment data was not timely or sufficient enough for teachers to adapt their teaching to be more proactive in the classroom. As Paul Bambrick-Santoyo, managing director of Uncommon Schools, argues without regular assessment, there is “no way to track student progress through the year and no way to identify problems in time to correct them.” So WestEd and ATI helped the district add mid-cycle or common formative assessments (CFAs) to refine the system. Now teachers monitor student progress towards mastery of curriculum objectives with weekly CFAs and quarterly benchmarks so that they can target instruction and plan immediate interventions geared to each student’s specific learning needs. These interventions, a form of differentiated or targeted instruction called “Reteach and Enrich,” are based on student responses to the CFAs developed by an assessment committee at Creighton using ATI Test Builder technology and formative item content. They focus on particular learning objectives, aligned to state standards and adopted as the curriculum for all of the district’s schools. So the CFAs can measure in real time the actual learning that is taking place in grade level classrooms at each school. Principals, their coaching staff, and teachers work hard to analyze this data in weekly collaborative meetings.


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Table I Creighton AZ Learns Performance 2008-2011 Data

| Number of Creighton Elementary School District Schools Across Performance Levels |
|-----------------------------------|------------------|-----------------|-----------------|-----------------|
| Highly Performing                 | 0                | 0               | 1               | 1               |
| Performing Plus                   | 0                | 4               | 7               | 8               |
| Performing                        | 2                | 5               | 1               | 0               |
| Underperforming or Failing to Meet Academic Standards | 7 | 0 | 0 | 0 |

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Reteach and Enrich:
Using Common Formative Assessments (CFAs) to Inform Instruction

At Creighton’s Loma Linda School, students spend a week focusing on a specific standard or performance objective, for example, understanding an author’s purpose or the main idea of an assigned text they’ve read. At the end of that initial instruction, they take an assessment, a CFA that generally involves 5-10 multiple-choice test items focused on the performance objective. This computer-scored test is usually a bubble sheet that also identifies the students, the grade, the school, and teacher. Using ATI’s Galileo, results are then analyzed and discussed at weekly data meetings involving grade-level teachers, student achievement coaches, and principals to target instructional responses to the CFA data. These collaborative teams identify which students did well enough to benefit from “Enrichment” instruction, for example, something around author’s purpose that will be more challenging for these students and engage higher order thinking based on Depth of Knowledge measures. For students who did not do so well, the idea is to redesign a “Reteach” lesson based around those students’ misconceptions about the author’s purpose or main idea. An important feature of Galileo is that test item responses include “distracters” that reveal the specific misconceptions students may have that led them to select a particular response on the CFA. The Reteach class can then address them. For example, a student may have grasped the general notion of “main idea” but have trouble with understanding “supporting details.” So the work of the team meetings is to analyze the data, determine which students have which misconceptions, and then split them into small groups to receive targeted instruction.

Data meetings operationalize Creighton’s assessment system at grade-level in each school. “They are used every single week by teacher collaborative teams,” says WestEd’s Joe Sassone,5 Director of Integrated Services and former assistant superintendent of the Vail Unified School District. “The power of ATI’s Galileo,” he adds, “is that it gives teachers some information as to what students are struggling with, and they can use that information to plan lessons.” At the weekly meetings, the team analyzes student misconceptions based on the CFA data, and then discusses “ideas for how to reteach this and differentiate instruction so we can help them reach the next level.”

A distinctive feature of Galileo, says ATI’s Feld, is that “it gives a true measure of progress. It’s not using the traditional classical test theory where you simply look at percent scores or how many items the student responded to correctly; it allows you to measure student progress along a path of learning as

5 In 2005, Sassone was awarded the Golden Bell Award from the Arizona School Board Association for District Academic Achievement and the Spot Light Success Award for Using Data to Drive Instruction from the Arizona Department of Education.

“ATI not only helped my leadership team but also our teachers to have a more data-driven focus.”

— Dr. Stephanie DeMars, Principal, Loma Linda
opposed to isolated test scores." But he emphasizes that it’s not just about the technology; making the system work “requires collaborative development of an implementation plan that involves all the stakeholders—a collaborative problem solving model. There’s also management and monitoring of the plan so that it moves forward successfully. And we’ve built tools into Galileo to help districts and schools do that.”

The 30-minute weekly data meetings are a component of a comprehensive reform toolkit that aims to integrate assessment with the technical assistance that WestEd provides for instruction and curriculum. The former involves intensive training on an array of research-based instructional strategies known in Creighton as Teach for Success or CT4S. The CSD diagram below has been adapted to show how the district plans and integrates instruction with assessment on a monthly cycle.
‘We’ve done a lot of training with Creighton’s principals, their instructional and student achievement coaches on the entire cycle,’ says Sassone. ‘So when they sit down with teachers and do planning, they have a step-by-step approach. Depending on the standard, the cycle represents about a month, including two weeks of planning and initial instruction—steps one through three—and then another two weeks of assess and reteach as shown in steps four, five, and six, which is where ATI comes into play with the CFAs.’

WestEd and ATI are also helping the district move to assessments based on the Common Core State Standards. ATI’s Assessment and Instructional Design staff is currently writing new item content, including constructed response items and other innovative item types that are more appropriate than multiple-choice items for assessing certain skills and addressing depth of knowledge concerns that are a focus of Common Core State Standards.

Sustaining Creighton’s reform effort, says Lynne Spiller, depends upon training all teachers in how to analyze data. She credits the new system with changing the mindset around assessment: ‘It helped change the paradigm from guessing, to knowing what kids need. And to do that, you need data that gives a better idea of what kids need for an intervention. It’s the biggest evidence that we have actually turned the corner.’

“ATI’s Galileo provides immediate feedback to staff and has changed our approach to instruction.”

— Dr. Charlotte Boyle, Superintendent, Creighton School District