Implementation Strategies

P.J. Jacobs Junior High School, Stevens Point Area Public School District

Stevens Point, WI

Grade(s): 7 – 9

Scenario: Laptop Carts

Purpose: Intervention, Supplement, Improve State Test Scores, At-Risk Students

ALEKS Portion of Curriculum: 50%

Time Spent in ALEKS: 1–2 hours per week; 20 hours per term

ALEKS Course: Mathematics - LV 5 (with QuickTables), Middle School Math Course 2, Middle School Math Course 3, Algebra 1

Laura Leahy, Teacher

I have used ALEKS during this past school year with a small class of lower-ability students. The purpose of the class is to support the regular hour-long math class students take and strengthen skills that are weak. I LOVE what ALEKS has been able to accomplish with my students. The Initial Assessment places students at their appropriate instructional level and shows the students where they are and where they need to get to. The individual topics are short and there are many options for the students to choose from. Once a student completes the topic, they later will review it and either continue on or have to redo the topic. It doesn't take long for the students to see that they can move at their own pace and are in a competition with only themselves to see what they are able to do. I love that ALEKS has been correlated to our textbook series. I can put in the chapter completion dates for our regular math hour and ALEKS will focus students on those topics until they are learned. The Time and Topic report is also a great tool. It only takes two or three weeks for my students to realize I know EXACTLY what they've been doing on the computer during a time period. If a student is visiting many topics but mastering none, I can focus my energy on supporting them or redirect them if they are not on-task.

Scenario

What challenges did the class or school face in math prior to using ALEKS?

Because all of our students are placed in the same Pre–Algebra course, we saw a need to provide extra support for our lowest–achieving students. We created a second math class for them to take in addition to their regular class. The class has a very unique population from at–risk students to those with learning disabilities in the area of math. I struggled to find a way to individualize their learning so that it was at the appropriate level for them without being too "babyish." When our school discovered ALEKS we found the missing piece we had been looking for. ALEKS has provided the means to meet the needs of each of my students individually. I can have them work on ALEKS for part of a class period or the whole thing, depending on what is being done in their regular class. This flexibility allows me to pinpoint individual needs and keeps all students in learning–mode while I work with small groups or individual students.

How many days per week is class time dedicated to ALEKS?

4-5 days per week.

What is the average length of a class period when ALEKS is used?

20-40 minutes.

Implementation

How do you implement ALEKS?

All of our students are placed in the same course at their grade level, but a second hour of math has been added for the lowest-ability students at each grade. That class has around 15 students in it and the purpose of the class is two-fold: The first goal of the class is to support the regular hour of math by re-teaching, tutoring, reviewing, and doing hands-on activities. The second goal of the class is to strengthen the math skills of those students. ALEKS is the tool we use for that second component.

Do you cover ALEKS concepts in a particular order?

At first, I targeted one specific piece of the pie at a time. This method worked alright and we started with whole numbers. However, once I realized that I could correlate my textbook with ALEKS, I knew I found the ticket! The program blocked certain topics to allow students to be more focused on what was most germane to them at that time.

How do you structure your class period with ALEKS?

Sometimes I have all students log on to ALEKS at the beginning of the hour and work for a time period, then have them all log out at the same time and do a group activity. Other times I have students get their homework out and I tutor for half the class period and then all students do ALEKS for the second half. I have also had half of the students work on ALEKS while I work with the other half

and then they switch. Sometimes, I also have everyone work on ALEKS and I pull one student at a time off of ALEKS to work with me individually. The flexibility of ALEKS is the best part!

How did you modify your regular teaching approach as a result of ALEKS?

ALEKS has allowed me to work with individuals and groups while the rest of the students work on ALEKS. ALEKS is NOT busy work – it is targeted instruction for individuals based on what their specific needs are in math. I know that ALL my students are engaged and learning during the entire class period because of this program!

How often are students required or encouraged to work on ALEKS at home?

I mention to students every Friday that they can work on ALEKS at home.

How do you cultivate parental involvement and support for ALEKS?

I sent home information about ALEKS at the beginning of the year and have discussed it at parent–teacher conferences. I plan on sending a letter home at the end of the school year with the student's ID number and my telephone number if parents need support over the summer.

Grading

Is ALEKS assigned to your students as all or part of their homework responsibilities? If so, what part of the total homework load is it?

The class I teach is designed not to produce extra homework, so I don't use ALEKS for that. However, I DO have students make up absences by working on ALEKS outside of class.

How do you incorporate ALEKS into your grading system?

The class I use ALEKS with is a pass/fail course. I have half of this determination based on progress in ALEKS.

Do you require students to make regular amounts of progress in ALEKS?

I usually expect at least two topics MASTERED at the end of each day. At the beginning of the year, students surpass this goal since they have a working knowledge of many of the topics. As the year progresses, those "easy" topics are completed, leaving the topics that are more challenging for them. Their goal of two topics per day becomes more difficult, but by then they are up to the task!

Learning Outcomes

Since using ALEKS, please describe the learning outcomes or progress you have seen.

This school year, students had 285 topics to do in order to complete the grade. I have seen growth in 100 percent of my students. Since ALEKS is not our core curriculum, students work on it for half of the class time. During that time, I watch my students gain confidence in their abilities. Out of my 15 students, one will complete all of the topics by the end of the year, one will be just short, and the rest will be between one—third and three—quarters of the way through. This is great progress for all of my students since some started the program with 4 percent mastery. As all eighth graders do, some complain about "having" to work on ALEKS on a given day. However, the funny thing I have noticed is that once students get started, they become very focused and accomplish quite a few things during that day.

Best Practices

Are there any best practices you would like to share with other teachers implementing ALEKS? Take the time to look at all of the reporting options.