

Implementation Strategies

Dolores Middle School, Dolores RE-4a School District
Dolores, CO

Grade(s): 6 – 8

Scenario: Computers in Classroom, Home Access

Purpose: Enrichment/Gifted and Talented, Core Curriculum

ALEKS Portion of Curriculum: 20–100%

ALEKS Course: Middle School Math Course 2, Middle School Math Course 3, Pre-Algebra, Algebra 1

Melanie Cook, Gifted and Talented Coordinator

As the Gifted and Talented Coordinator, I use the ALEKS program to ensure that the students who are going to be accelerated in mathematics do not miss a grade-level curriculum and are fully prepared for the next level. Because ALEKS allows students to move at their own rate, mathematically talented students are able to complete a grade level within a few weeks' time. When they begin their upper-level courses, in either a classroom or in ALEKS, they are primed for success. Both of our state-level qualifiers for MathCounts this year have completed one or more ALEKS courses to build their skills. ALEKS is also an effective way to differentiate curriculum, allowing upper-end students to work on different objectives from the rest of the class, while still being able to rejoin the class for projects and non-routine problem solving.

Scenario

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

High school teachers have previously claimed that accelerated students had gaps in learning as a result of missing the regular curriculum.

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

2 days per week.

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

50 minutes.

Implementation

How do you implement ALEKS?

I assess students to determine where to start them. I use ongoing assessments, both formative and summative, to decide when students should use ALEKS and when I will keep them in class. For my independent study students, I basically let the program manage their curriculum.

Do you cover ALEKS concepts in a particular order?

No.

How do you structure your class period with ALEKS?

I either give students permission to use ALEKS or they join the class for a lesson or activity.

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

I have not modified my approach since ALEKS is a supplement for some students and an independent study for even fewer students.

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

Students using ALEKS on any given day are required to put in 15–20 minutes per night at home, about the same amount of time as a traditional homework assignment.

How do you cultivate parental involvement and support for ALEKS?

Parents and their students sign a contract stating their understanding of ALEKS based on written material. Each week I include the amount of time their child has completed that week and an update on the student's learning outcomes in PowerSchool.

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?

It really depends on how I'm using ALEKS. For the independent study students, ALEKS is used for all of their math homework. For the students who I'm differentiating the curriculum, it varies from 20 percent to 100 percent of their math homework in any given week.

How do you incorporate ALEKS into your grading system?

It varies a lot, depending on how I'm using ALEKS.

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

No, I only require that they are making steady gains and working towards a predetermined completion date.

Learning Outcomes

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

My students who use ALEKS have maintained an advanced level on mandatory state and district assessments. Students build necessary skills using ALEKS and feel good about their rapid progress.

Best Practices

Are there any best practices you would like to share with other teachers implementing ALEKS?

I highly recommend additional conceptual development and problem solving.