

## Choose When and How to Implement Aha!Math

Consider these important tips as you make decisions about when to use Aha!Math and how to implement it with students.

<p style="text-align: center; color: white; font-weight: bold; font-size: 1.2em;">Supplemental</p>	<p>Aha!Math offers additional instructional material to supplement your existing curriculum. Consider these questions to help you determine what which units and which components within a unit to implement:</p> <ul style="list-style-type: none"> <li>• What Aha!Math concepts fit into my current pacing plan?</li> <li>• Do all the lessons and activities align to the standards that I am teaching?</li> <li>• How much time will I need for students to view the lessons and participate in the games?</li> <li>• What have I previously used with students to learn this topic? Is this a better approach? Is this an additional approach?</li> </ul> <p>For example, instead of teaching the concept “greater than and less than,” have your students interact with the games “Counting Numbers I” and “Counting Numbers II” in the Kindergarten Unit 1. Students will learn about these concepts through their interaction in the games and you will gain individual reports for how well each student is performing.</p>
<p style="text-align: center; color: white; font-weight: bold; font-size: 1.2em;">Intervention</p>	<p>Aha!Math offers students instruction that is individualized and focused on the topics they still need to learn. Consider these questions to help guide your use of Aha!Math as part of your intervention for students.</p> <ul style="list-style-type: none"> <li>• Which students need intervention? For what topics do they need intervention?</li> <li>• Are there small groups of students that could be grouped by a topic so that intervention can still have instructional time?</li> <li>• What time do I have for intervention? What space do I have?</li> </ul> <p>Using Aha!Math as an intervention will allow students a very nontraditional view of a topic they may feel they have already failed. Aha!Math provides on-going and immediate feedback, along with the content embedded in context and through games, that will motivate the learner to keep trying.</p>

## How do I implement Aha!Math?

Because Aha!Math is Web-delivered, students can access it wherever they have Internet access and a computer, allowing them to continue to hone their skills.

### Whole Class Instruction

There are two components of Aha!Math that are most easily implemented through whole class instruction. *Instructional Modules*, which exist within the Grade 3-5 units, are designed to have the teacher as an integral part of the instruction. Since an *instructional module* is an animated form of direct instruction, students do not interact online. This does not mean that you will not want to have students engaged in learning. You will want to preview an *instructional module* before using it with the class. When you project the video for the entire class to view, Aha!Math allows you to pause at any time to ask students questions or to have them demonstrate their learning.

As an example, view the *Instructional Module* in Grade 3 Unit 1 on multiplication titled, "Models of Multiplication." This instructional module introduces students to various ways of modeling multiplication. Pause the video after one model is shown and provide students with additional examples of multiplication problems using this same model. By the time you finish the video, students will have seen several multiplication problems using each of the models.

You may also use the *Instructional Modules* to have student take notes during the video and then together review what notes were critical. Students often have difficulty pulling out important facts and effectively recording them. Modeling note-taking helps students build skills to pull out the important mathematical concepts, reinforces those skills, and reinforces critical language arts skills.

*Activities* are designed to be implemented as a whole class. Because *activities* are written and delivered as a PDF, they are not completed using the computer. Often the activity is completed with the teacher providing the instructions before beginning, then students work individually, in small groups, or through whole-class discussions.

<p><b>Small Group</b></p>	<p>Most components of Aha!Math can be implemented in small groups, for example, when students are grouped for intervention. When this is the case, it will benefit students to work together through most of the components. While you as the teacher will be involved to pose critical questions, Aha!Math allows for the flexibility for each student to build the skills specifically he or she needs to improve. Small groups also are beneficial for exposing students to a game for the first time. Having students begin the play in small groups will encourage them to learn each other's problem-solving strategies.</p>
<p><b>Individual Students</b></p>	<p>While most components of Aha!Math can be done by students in groups, the lessons and games work best when students work independently. The <i>lessons</i> parallel the Instructional Modules that exist in grades 3-5. Each <i>lesson</i> reinforces the learning that was presented in the instruction and asks students to participate in the learning. By having students work individually through the lessons, the data provided in the reports will be meaningful and allow you to follow the learning for individual students.</p> <p><i>Games</i> exist in all grade levels and while you can pair students during the initial use of each <i>game</i>, individual students will benefit from the learning and the individualized feedback when working independently. The reports provide you with valuable information on each student.</p>
<p><b>Computer lab</b></p>	<p>A computer lab is a great place to implement small groups or individual instruction using Aha!Math. When you don't have enough computers in your own classroom, turn to the computer lab when you are ready for students to work independently.</p> <p>For example, after students receive instruction on learning the numbers 1 to 10, and have worked as a class to count items and to put items into a collection, it is time for students to work more independently. But you aren't quite sure you want them counting objects independently as they are still struggling and need some guided practice. Furthermore, there is only one of you. In the computer lab, log students into the Kindergarten Unit 1 <i>Game</i> titled "One Fish, Two Fish II". This <i>game</i> guides students to count by adding a specific number of fish (from 1 to 10) into an aquarium. In addition to students getting individual feedback, Aha!Math's reports help you understand which students are getting</p>

	<p>this concept with ease and which ones are still a little confused.</p> <p>In addition to students working independently through games, have students work independently in a computer lab through <i>lessons</i>. While each <i>lesson</i> parallels an <i>Instructional Module</i>, it also engages students in the learning using the technology. As each student works through a lesson, he/she receives ongoing feedback to guide their learning, key to motivation</p>
<p><b>Mobile lab</b></p>	<p>Many schools are obtaining mobile labs for use in the classroom. Integrate a mobile lab into your classroom for those topics that are particularly challenging for students to learn. Using a mobile lab works just like the computer lab: each student has opportunity to work through <i>games</i> and <i>lessons</i> while receiving individual feedback throughout the learning.</p>
<p><b>After-school programs</b></p>	<p>Schools in many states are partnering with cities and youth organizations to provide after-school programs to support student in remediation/intervention and for acceleration. Aha!Math meets both of these needs. Struggling students can partner to work together through the units they have covered in your class. Enroll your students in the lower grade units at the beginning of a new year to get them excited about learning mathematics. For excelling students have them work at the current grade or higher level topics. Remember, that with a supplemental program, your students will need your assistance regardless of whether your intent is for remediation</p>
<p><b>Library and community centers</b></p>	<p>Encourage parents to take their students to libraries or community centers to access the technology if they do not have Internet access at home. Suggest that students log into the system and to use a lesson to teach their parents a concept or for the family to collectively play a game you have already used in class.</p>
<p><b>Home</b></p>	<p>Home is an excellent opportunity for students to gain additional time on learning mathematical concepts. For example, choose a game that students have already worked through in class. Encourage them to “raise their score”. Home use also offers an opportunity to engage parents in their students’ math learning.</p>