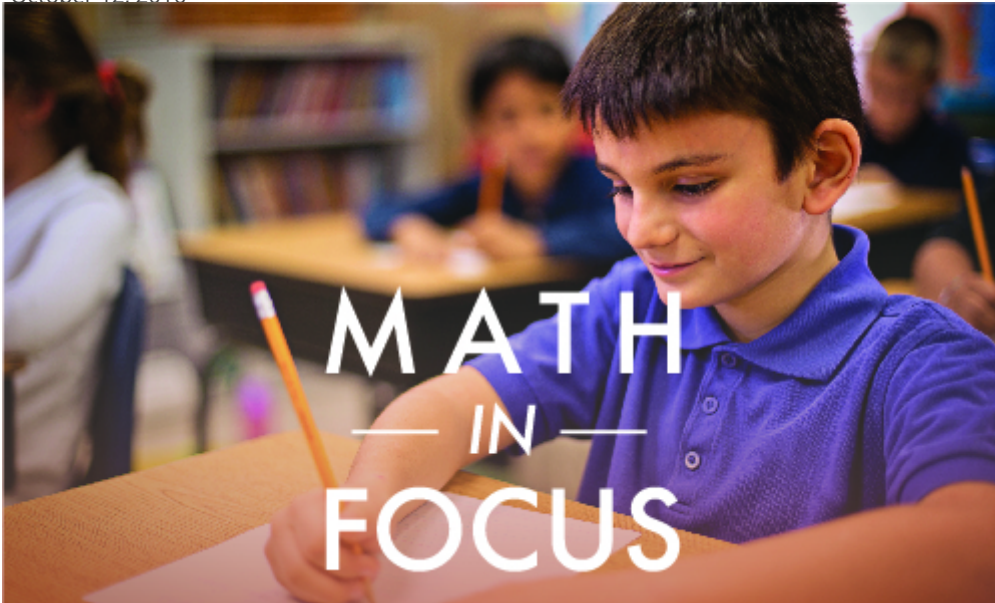


Math in Focus: Building a Solid Math Skills Foundation

October 12, 2016



For many ResponsiveEd schools, this is the third year of using Math in Focus: Singapore Math in grades K-8. It is a curriculum designed to produce math competency and set students up for success at the high school level and beyond.

Bonnie Wimberley, ResponsiveEd’s Director of K-5 Mathematics, is an advocate for the program and believes it is having an impact on students’ ability to master math.

“What I really like about Math in Focus is that it lets children own their thinking. It is not so much about following a particular problem-solving process, but understanding the structure and relations in math so that they can arrive at the correct answer in their own way. It teaches practical skills and not just a process you will forget in a few years,” said Mrs. Wimberley.

Singapore math is the curriculum and teaching methods used in Singapore. Students there have consistently ranked at the top of international math assessments thanks to the curriculum’s approach to competency building. Math in Focus is an Americanized version of the program.

Kristin Zamarripa, a first grade teacher at Coppell Classical Academy, appreciates the program’s lack of busy work and facilitation of individualized learning.

“From my perspective, Math in Focus is great. Everything you need is given to you. From extended lessons to reteach sheets, it is ready to go. My students take a pre-test at the beginning of the

chapter on Mondays and I can see where they are and what I need to focus on. I can then move certain students along and take more time with other students," she said.

After each lesson, students work through problems in their workbooks. However, based on their understanding of the lesson, Ms. Zamarripa can give her students on-level practice, reteach practice, or more advanced practice. This individualized approach to student learning allows a teacher to focus on mastery by making sure no student slips through the crack and no student is held back.

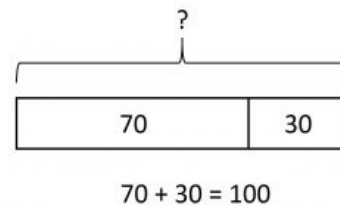
Math in Focus Curriculum Distinctive

The curriculum is based on the idea that learning is active and that children construct their knowledge by building on their past knowledge and add new ideas.

"The curriculum asks students to do a lot of critical and creative thinking. It makes learning very active. Students have to investigate rather than simply compute. It really helps students relate concepts to each other and to the real world," said Mrs. Wimberley.

The Math in Focus method focuses on guiding the progress of students understanding first in concrete objects like Base Ten Blocks, then in the pictorial representation like bar molding, until they are ready to move to abstract symbols.

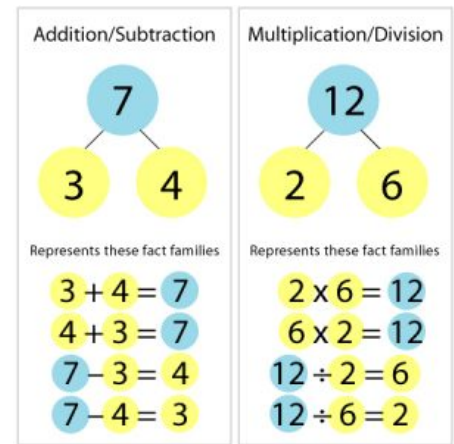
"The abstract is always the goal because you can't always have your base ten blocks there to help you when you go to the grocery store. However, kids really get it when they learn starting with a visual. You can see the lights go on. Whether they can jump right to abstract math or need concrete aids for some time, they can all solve the same problem regardless of their approach," said Mrs. Wimberley.



[Click here to watch a video on bar molding](#)

To help students build on prior knowledge, Math in Focus emphasizes the relationships between concepts and topics. By understanding how different mathematical concepts are related, students are better able to apply what they currently know and to problem solve.

“Math is all about logic and recognizing patterns. By helping students see the interrelationships between concepts and topics, they are able to take that step from routine memorization to actively engaging in what they are learning. If they can recognize a pattern and see how concepts relate, they can crack the code and solve the problem. This really comes into play through number bonds where a student can see the relationship between $3 + 7 = 10$ and $13 + 7 = 20$,” said Mrs. Wimberley.



[Click here to watch a video explaining the use of number bonds](#)

In the end, the greatest benefits of Math in Focus are that it builds solid math skills and allows teachers to quickly assess where their students skill levels are and then provide additional instruction.

That, according to Mrs. Wimberley, helps teachers ensure students master concepts and prepare for the higher level math they will learn later in school.