



mathspace

Mathspace High School Traditional Series

Publisher's Background Information

Mathspace believes that every student can excel at mathematics with the right help at the right time, and we want to be that right help.

Mathspace has been committed to providing innovative and effective tools for teaching and learning mathematics for the past 13 years.

Development of Materials

The Mathspace team is made up of mathematics educators and experts from a variety of backgrounds. The process of creating the Mathspace textbooks is a collaborative one starting with ensuring a common understanding of each Common Core State Standard (CCSS) for Mathematics as well as the progression of standards and concepts throughout the series. Everything comes back to the intent of the CCSS, and our curriculum developers are constantly thinking about the best way to illuminate these standards for students.

This process begins ensuring that all of our developers have a deep and shared understanding of each Common Core State Standard for Mathematics. This common understanding is crucial for two reasons:

1. It ensures that the curriculum is highly aligned with the standards.
2. It makes the curriculum coherent and consistent across different grade levels and throughout each course.

Mathspace's textbooks are crafted with a keen awareness of the progression of standards and concepts throughout the AGA series. This progression is vital as it highlights the interconnectedness of mathematical concepts both within and across grade levels. By thoughtfully mapping out how students are introduced to and develop various mathematical ideas over time, the textbooks create a seamless and logical flow of learning. This structure aids students in building a strong foundation in earlier grades that they can then build upon in subsequent years. It also assists teachers by providing evidence of how each individual standard or skill falls within the CCSS as a whole.

Moreover, the connection between standards within and between grade levels is a crucial aspect of Mathspace's curriculum design. This connection ensures coherence in learning, allowing students to see how mathematical concepts evolve and relate to one another as they advance through their education. For example, a standard introduced in a lower grade level might focus on the foundational understanding of a concept, which is then expanded upon and applied in more complex ways in higher grade levels. This continuity not only aids in deepening understanding but also helps in retaining and applying mathematical knowledge in varied contexts.

Every student is unique. Understanding these differences in their background and how students learn, the curriculum is designed to offer multiple opportunities for students to demonstrate their understanding. This approach acknowledges that learning is not a linear process and that students benefit from being able to approach problems and concepts in various ways. By providing diverse methods of engagement and problem-solving, Mathspace enables students to find pathways to understanding that work best for them, thereby fostering a more inclusive and effective learning environment. Some of the ways that Mathspace allows students to engage in the materials are through:

- Open-ended rich tasks
- Collaborative group work
- Technology-enhanced explorations
- Demonstrating conceptual understanding
- Questions emphasizing procedural fluency

In summary, Mathspace's approach to textbook creation emphasizes a collaborative, rigorous, and student-centered process. Their commitment to aligning with the CCSS, coupled with a focus on providing multiple opportunities for student success and illustrating the interconnection of standards across grade levels, ensures that the resulting materials are not only educationally sound but also highly effective in fostering a comprehensive and enduring understanding of mathematics for all learners.

Evidence of Efficacy

The Utah Education Policy Center recognized Mathspace's positive impact on student achievement through an evaluation conducted by the Utah STEM Action Center.

The results showed that students using Mathspace experienced significant growth over the period. In particular, students who were not proficient in the prior year demonstrated exceptionally high growth.

Students using Mathspace showed a 53% increase in likelihood of math proficiency. In particular, students using Mathspace who were non-proficient in the previous year showed a 66% increase in the likelihood of math proficiency.

This data was further reviewed by independent research group Empirical Evidence, who concluded that Mathspace meets the criteria for Tier III ESSA evidence

Supplemental Services

Just as every student in a classroom is different, with varying areas of strength and areas of need, we also believe that every school and every district is unique. As such, we tailor our supplementary services to each individual customer.

Implementation will look different, so the implementation support should look different too.

Our training can be done virtually or face to face, and the volume and content of the training is a la carte.

We seek to understand the needs of our customers and to work collaboratively to develop the best and most relevant possible support before running the training.

Some considerations we keep in mind are:

- Other math tools or platforms used in the district
- Size and demographic of the school or district
- Specific district areas of focus in mathematics
- Diversity and needs of special populations
- Level of access to technology
- Previous curriculum used
- District strategic goals

Working in conjunction with district leadership, we coordinate an agenda and goals to ensure the success of the implementation.

We also subscribe to the philosophy that implementation is ongoing. As such, our customers have access to a dedicated Customer Success Manager, and we communicate regularly with our customers to track progress toward goals and provide updates and best practices on the implementation of Mathspace's Curriculum.

For customers who desire more asynchronous or on-demand implementation support, Mathspace provides a number of options, including:

- An invite-only Community to share thoughts, feedback and wins with other users
- Live chat support for all teachers and administrators
- Online eLearning courses teaching best practices
- A searchable repository of help articles and FAQs

Our Customer Success and Implementation team is highly experienced and trained in best practices for education, as well as being Mathspace product experts, and they thrive on being able to partner with our customers to solve the complex problem of curriculum implementation.

Summary

Mathspace's High School Traditional curriculum has been developed over many years, from the humble beginnings of a small company trying to make a difference in math education, to now being an effective, highly supported resource that is central to improving student learning outcomes and supporting math educators everywhere.