Mineola Mathspace Pilot Study Brief

Product Info

Product Name: Mathspace

Product Description: Mathspace is a webbased math program that features student-led and teacher-assigned questions, videos and lessons, a hint button to assist students in solving problems, and an interactive writing feature that enables students to write "on-screen."

Learning Focus: A supplemental or core curricular adaptive math tool for students in grades 5-12 Teacher Training: Offered via webinar

Student Usage Minimum: Teachers assign tasks to students at least three times per week

Device Specifications: Web-based app; requires login and Internet access

Cost: \$20 per student

District Context

Mineola Union Free School District



Mineola Middle School



District demographics: Mineola Union Free School District (MUFSD) is located in Mineola County, New York and serves 2,850 students in five schools. **Pilot demographics:** Mineola Middle School serves approximately 600 students in grades 5 through 7.

Number of Students in Pilot	Number of Teachers in Pilot	% Free or Reduced Lunch	Speak English at Home	Grade Levels in Pilot	K-12 Students with Access to a Personal School- Provided Device (1:1)	Students with Access to High Speed Broadband at School
191	4	28%	87.1%	5th	100%	100%

Pilot Implementation

Pilot Goal: At the start of the pilot, Mineola had already purchased Mathspace and successfully implemented it in the 6th through 8th grades.

For this study, MUFSD wanted to pilot the product with 5th grade students to help them review and enrich their skills.

January 2016 February 2016 May 2016 Data collection site visit Student and teacher pre-surveys administered; Mathspace implementation began Student and teacher post-surveys administered Mathspace implementation ended

Implementation Model: Teachers and students used Mathspace regularly for over six weeks. Teachers reported using Mathspace in class for 1-2 hours per week, and students were also expected to use Mathspace outside of class.

Findings

Quality of Support: Professional development was offered at the beginning of the pilot by Mathspace product developers and support was available throughout the process via online chats. Teachers and school leaders reported that they relied more frequently on support from colleagues, who were already familiar with and using Mathspace, than the professional development they received. **Data collected:** Student pre- and postsurveys, teacher pre- and post-surveys, teacher interviews, school leader interviews, product usage data (provided by Mathspace); and student pre- and post- learning/ benchmark assessments.

Educator engagement: In general, teachers assigned more custom tasks than adaptive tasks in Mathspace. Because custom tasks require more time to create, this indicates that teachers were consistently and actively engaged.

Educator satisfaction: Teachers were overwhelmingly positive about Mathspace.

In particular, they praised Mathspacegenerated reports for giving them greater insight into their students' performance and math understanding.

Student engagement: Despite some challenges, 70% of students found Mathspace easy to use and completed assigned adaptive tasks at a rate of 100%. **Student satisfaction:** Students were generally satisfied with Mathspace, and particularly enjoyed the ability to work at their own pace.

Student learning: Students had a statistically significant 17% increase in test scores from the beginning to the end of the pilot.

Outcome

Purchasing Decision: After the pilot, MUFSD adopted Mathspace for 5th grade students. The district also continues to use the tool with 6th-8th grade students, and is now piloting a beta version with 4th grade students.

For more information, see:

http://digitalpromise.org/wp-content/ uploads/2016/11/rapid-cycle-pilotsmathsixdistricts.pdf



www.digitalpromise.org