Middle School Math Adoption Committee

December 5, 2017 Minutes

SPS Staff members present: Jenna Velozo, Jasmine Riach, Jon Moor, Lisa Kadobayashi, Lynn Rody, Julie Gatti, Hillary Graham, Travis Sims, Seth Bundy, Wendy Miller

Community members present: Anita Koyier-Mwamba, Kim Fergus, Carol Cheyne, Helen Gerety, Fredrick Ngobi, Philip Kong, Phyllis Lewis

Adoption coordinators: Anna Box and Patrick Gray

1. The adoption committee reviewed the proposed agenda for the day.
2. The adoption committee reviewed a draft of the 11/28/17 Minutes. The minutes were approved with the addition of item 4: a note about textbook committee expectations for teacher professional development during the rollout of the new textbook.
3. Committee reviewed ADA Compliance provided by SPS Department of Technology Services (DOTs) and SPS Consent Decree Requirements:
   • Discussion of requirements of the consent decree and implications on usage.
   • Discussion of importance of on-line content of both enVision and Glencoe. Acknowledgement that while implementation varied in the pilot, there is evidence that teachers, parents, students, and principals like the on-line components of both programs.
   • Notice that, although neither is in full compliance, enVision scores higher on ADA compliance rating.
   • Possible solution from a committee member: What if representatives from many partners (the school district, parents, community-based organizations, teachers, etc.) come together to craft suggestions for best practice for implementation before teacher professional development (PD) on textbook usage starts. It is important to hear from all these groups early to bridge the gap between needs and realities.

Decision to let this information about ADA compliance and accessibility inform the rest of the day’s work.

4. Committee members reviewed data gathered from students and teachers participating in the pilot
   a. Pre- and Post-test Data: All pilot teachers were asked to administer a locally created pre- and post-test to help determine if students seemed to be learning more or better from one text than the other. A team of JSC math staff, using a common rubric for scoring to attain maximum interrater reliability, graded these assessments. Committee members were provided a summary of the student level data

   Observations from committee members:
   • Overall growth seemed to be slightly higher for students being taught from enVision.
   • Caveats included the fact that student outcomes are often teacher dependent, the sample sets are small, and a wondering about the validity of a locally made assessment,

   An additional recommendation was made that the adoption committee and the math content area should commend the teachers who piloted these curricula.

   b. Smarter Balanced Interim: The SPS Research, Evaluation, and Accountability (REA) office recommended administering the Smarter Balance Assessment (SBA) EE1 Interim to Grade 8 math students participating in the pilot. Madison middle school (which piloted enVision) and Hamilton Middle School (which piloted Glencoe) were able to test the vast majority of their students learning Grade 8 math. Approximately 50% of students in 8th grade at Hamilton are sixth or seventh graders. Approximately 40% of students in 8th grade math at Madison are sixth or seventh graders.

   REA analyzed this interim assessment data and reported that students using enVision have a higher probability of meeting or exceeding standard on this interim than students working using Glencoe. REA reported that in general the strongest indicators of student success are previous year’s scores and
demographic information. For this particular SBA analysis REA was able to “control” for demographics and previous scores so as to distill out the impact of the textbooks. Their finding was that the difference is statistically significant – students learning from enVision are more likely to meet or exceed standards on this interim than students learning from Glencoe. (REA also stated as a caveat that they wished more schools had been able to participate in the 8\textsuperscript{th} grade EE1 interim.)

Discussion:
- The data from the SBA interim may not be more convincing than the other data because it continues to look at the same group of students with the same group of teachers.
- The difference in the data could be dependent on the teachers or the schools rather than the textbook.
- In enVision, we have, potentially, a curriculum that delivers student growth that can be measured by a standardized test.
- A committee member noticed a “powerful difference” in the two sets of students. The school with higher numbers of students working above grade level was learning from Glencoe. That school did not have similarly higher levels of achievement on the SBA. The school working out of enVision had the higher levels of achievement and the lower percent of students working ahead of grade level.

c. Pilot Teacher Feedback: Committee reviewed a summary of feedback from pilot teachers. The discussion included:
- The pilot teachers’ comments mirror last week’s feedback from committee members who are also pilot teachers. Overall, both programs received generally favorable remarks from teachers responding to the survey. EnVision received slightly higher marks than Glencoe.
- Glencoe may have a slight advantage in one area - its electronic teacher tools.
- Glencoe had a few instances of standards mis-alignment mentioned. EnVision appears to align to standards better than Glencoe does.

5. Deliberation and Recommendation

A straw poll revealed that all committee members except one expressed a preference for recommending enVision for adoption. No committee members voted to forward Glencoe for adoption. One committee member wondered whether to reject both. This committee member was disappointed that neither book develops student knowledge through discovery, experience, and story as much as CMP (Connected Mathematics Project – SPS’s previously-adopted middle school curriculum) did. This committee member said, “Yes, we have evidence enVision is better. But, both of these books are algorithm focused. Is it possible this isn’t the direction we want to go? Will we regret this decision in a couple of years when a newer/better option comes out?” Another member shared this concern.

A discussion ensued about the advantages of recommending enVision over recommending neither.

Reasons adoption committee members gave for moving to adopt enVision (rather than moving to recommend neither program):
- Consensus that the enVision books will meet the needs of new, busy, and/or overwhelmed teachers.
- Consensus that the enVision books will be useful for parents, instructional assistants, special education teachers, tutors, and other adults in their work to support student learning.
- Agreement that while students do need opportunities to balance procedural understanding with opportunities to make meaning of the math, there is evidence that enVision will give the procedural base.
- A teacher that piloted enVision noted that in her opinion there is enough conceptual development in enVision. Specific enrichment and extension features of enVision were noted by pilot teachers.
- Both are good. Neither will be harmful. Neither has bias or socially harmful components. Both are aligned to standards. EnVision scored higher in every category reviewed.
- There is much benefit to having everyone do the same thing district-wide. We need an adoption now. Not adopting a curriculum leaves kids in different places throughout the district.
Reasons adoption committee members gave for moving to recommend neither program:

- Adopting a heavily procedural textbook is not in line with many current math education research trends.
- Having a single curriculum does not guarantee all teachers at all schools will use it.

6. **Recommendation**
   Using its decision-making protocol, the committee voted unanimously to recommend *enVision* for adoption.

7. **Discussion of budget options**

   *EnVision* comes in a consumable version that is projected to cost $1.78 million over seven years and in a hardback version that is projected to cost $1.28 million over seven years. The hardback version does not currently exist but would be created for SPS schools. SPS pilot teachers and students used the consumable version. Our understanding is the content of the hardback version is exactly the same as the content of the consumable.

   **Comments in favor of the consumable version:**
   - A pilot teacher remarked that she really enjoyed the consumable version. Having a consumable product meant she could spend her preparation time planning not making copies.
   - The consumables may offer benefits to a newer or novice teacher since there is nothing they have to create or photocopy.
   - Buying the consumable for all students may improve equity. The hardback requires teachers to photocopy pages for students to write on and not all schools have the same budget for copier paper.
   - Some students are able to transfer from hardback to their own paper, but others struggle with this.
   - When using a consumable, teachers can choose which pages students write on, tear out, turn in, etc. There is enough content that the consumable book is still a helpful reference for working at home.
   - Consumables help students who have lower fine- and gross-motor skills.
   - Consumables offer more flexibility to teachers in how to use the book than a hardback does.
   - Even though the consumable version is more expensive than the hardback, the total cost is still well under budget.

   **Comments in favor of the hardback version:**
   - The hardback is cheaper

   **Motion and Second to Adopt *enVision* in the consumable version**
   Motion carried by consensus

8. **A motion was made and seconded to include with the textbook recommendation a recommended number of days of teacher professional development (PD)**
Motion carried by consensus

   There was a discussion of past practice and ideal professional development needed for a successful implementation.

   **Recommendation of 8 days of professional development for all teachers:**
   - 3 days before school starts, in June, August, or Saturdays in September for late hires. These days would address best practices for using the text as well as provide opportunities for planning the first two units of study.
   - 4 days during the school year in preparation for upcoming units
   - 1 day at the end of the year for synthesis, lessons learned, and incorporating parent and community feedback.
The adoption committee feels strongly that face-to-face professional development is key to a successful rollout and implementation. The cost of purchasing the consumable version of *enVision* and paying teachers to attend this many PD days totals less than the cost of purchasing the runner up product, *Glencoe*.

Proposed dates (pending approval of funding and calendar agreement) and topics for professional development

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<th>Proposed Dates</th>
<th>Topic(s)</th>
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<td><strong>Before Implementation</strong>&lt;br&gt;Teachers choose one of the following:&lt;br&gt;• June 26-28 (Tuesday – Thursday) or&lt;br&gt;• August 20 – 22 (Monday – Wednesday) or&lt;br&gt;• Three Saturdays in September</td>
<td>Day 1: Textbook features, scope and sequence, state standards&lt;br&gt;Day 2 Teacher tools and strategies for best use of consumables&lt;br&gt;Day 3 Planning and best practices for Units 1 and 2</td>
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<td><strong>October 12th</strong></td>
<td>Planning and best practices for Units 3 and 4</td>
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<td><strong>January 14th, 15th, or 17th</strong>&lt;br&gt;• One day for Grade 6&lt;br&gt;• One day for Grade 7&lt;br&gt;• One day for Grade 8</td>
<td>Planning and best practices for Units 5 and 6</td>
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<td><strong>March 4th, 5th, or 7th</strong>&lt;br&gt;• One day for Grade 6&lt;br&gt;• One day for Grade 7&lt;br&gt;• One day for Grade 8</td>
<td>Planning and best practices for Units 7 and 8</td>
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<td><strong>June 10th, 11th, or 13th</strong>&lt;br&gt;• One day for Grade 6&lt;br&gt;• One day for Grade 7&lt;br&gt;• One day for Grade 8</td>
<td>Reflection, synthesis, lessons learns, incorporation of parent feedback</td>
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