

Multilingual classroom encounters with science of reading curricular initiatives: Reporting on a year of implementation in Minnesota

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This study provides a timely look into one school's first year implementing a Science of Reading-informed literacy curriculum with multilingual learners. Our findings place the perspectives of teachers employing the curricula front and center.

Keywords: evidence-based literacy instruction, science of reading, reading policy, implementation

Introduction

Minnesota is one of 40 states that have attached significant funding to schools to adopt Science of Reading (SoR) informed approaches. The *READ Act* (which replaces similar legislation, *Read Well By Grade Three*) is legislation with a focus on reading curriculum, teacher professional development, and teacher preparation. Notably, the READ Act stipulates that all teachers responsible for teaching reading must participate in professional development in evidence-based instruction. Additionally, districts that wish to use the funding attached to the bill must implement an approved SoR-informed literacy curriculum.

With this state-wide reading reform in place, research is needed to describe stakeholders' experiences, including (but not limited to) teachers, leaders, students, and school communities. Research is especially critical for stakeholders serving multilingual learners (MLs). Policies and practices that focus on MLs are ambiguous in many states. In a recent review of SoR reform legislation nationwide (Neuman, Quintero, & Reist, 2023), only 13 states included substantial information to inform multilingual learner consideration in SoR policies and practices. Even though Minnesota's READ Act specifically points out the use of native language in reading instruction (MN Statute, 120B.12, section 4), more support is needed to transfer this legislation to SoR-informed classroom practice.

This study provides a timely look into one school's first year of implementing a SoR-informed literacy curriculum with MLs. Our findings place the perspectives of teachers employing the curriculum front and center.

Multilingual learners and evidence-based reading instruction

Multiple factors should be considered when designing and implementing literacy instruction for MLs. In a recent review of research on SoR-influenced reading instruction for MLs, Kittle, Addendum, and Budde (2024) share that effective practices for include "use of students' home language, direct and explicit instruction in English reading skills and strategies, peer-mediated instruction, enhanced instruction with scaffolds such as videos or structured writing, and use of multicomponent reading instruction" (p. 107). We also know that while systematic and explicit

phonics instruction is necessary for MLs to develop the code-related skills to become proficient readers (Lesaux & Siegel, 2003), these learners need more instruction in developing oral language to support content knowledge (Goldenberg, 2020; Hwang & Duke, 2020).

In addition to a focus on code-related skills like phonemic awareness and phonics, effective literacy development for MLs “embraces a second language development pedagogy and recognizes their dual language brains and identities through affirmation and activation of the home language and building of cross-language connections (Olsen, 2022, p. 1).” Further, Baker et al. (2014) make a series of evidence-based recommendations, including providing small-group instruction in literacy and building opportunities to develop written language in English. Olsen (2022) suggests a comprehensive approach to teaching MLs that is flexible and includes “differentiated instruction based on formative assessments” (p. 2).

To determine how these practices are enacted in schools, we turned our attention to an elementary school that was an early adopter of a SoR-informed curriculum. We explored the following research question: *How do teachers of early elementary MLs experience the shift in literacy instruction toward Science of Reading-informed approaches?*

Study and context

Using a case study design (Yin, 2018), our study took place at Sunnyside Elementary (pseudonym), located in an inner-ring suburb of a large metropolitan area in the Midwest. The school’s minority student enrollment is 74%, with nearly 40% identifying as Latino/Hispanic and 32% identifying as English learners. The school enrolls 38% economically disadvantaged students.

Participants

Throughout the 2023-2024 academic year, we studied the experiences of thirteen K-2 teachers at the school as they implemented new SoR-informed literacy curricula for the first time in their classrooms. All K-2 teachers who participated in the study had received training in *Lexia Language Essentials for Teachers of Reading and Spelling® (LETRS®)* before joining the study for at least one year. Eight of the thirteen teachers taught in a dual immersion Spanish program, three taught in the school’s English-only program, and one was an ML teacher who provided pull-out language support.

Data collection and analysis

During one academic school year, once a month, we observed eight K-2 classrooms during the literacy block. We conducted individual interviews with all classroom teachers, led two mid-year focus group interviews, and administered pre- and post-surveys.

Using interview transcripts and observation notes, our team of four researchers individually coded themes from the interview data according to Merriam’s (1998, p. 181) guidelines. We then compared themes, named them, and devised a classification scheme. We shared initial findings with classroom teachers, the school principal, and district literacy leaders.

Findings

Positive response to reading training

The teachers in this study found the LETRS® training to be beneficial. They supported the district's decision to implement a SoR-informed approach to literacy instruction. Just 39% of students scored at or above proficient levels on their state reading assessment, and teachers hoped that a SoR-informed approach would improve their ability to teach reading. Teachers were enthusiastic about implementing SoR-informed instruction in their classrooms.

However, teachers' concerns about implementing the district's chosen curricula were immediately visible. Through classroom observations and teacher interviews, the prescribed implementation of three SoR-informed curricula chosen by the district appeared to impede educators' ability to serve their multilingual students, captured in three critical findings below.

Curricula offered limited opportunities for differentiation and feedback

Instruction was delivered through a scripted curriculum that mandated a dominantly whole-group and teacher-centered approach and offered limited opportunities to differentiate instruction. We observed few opportunities for small groups, guided practice, or independent practice with coaching—essential literacy practices for MLs. One teacher noted that despite her efforts to plan daily small group instruction, she found “...*the curriculum is very time-consuming in its different aspects. It's very rare that we actually make it to that time [small groups], which is when I feel like I get to see my students' needs and help them the most.*”

Teachers also described limited opportunities to assess and give feedback to students about how they were performing with skill development. They did not feel they could give individual feedback because of the strict teach-to-fidelity requirement. Teachers shared their concerns about deviating from this requirement. One teacher shared, “*At the end of the year, I don't want anyone to be able to say, 'Oh, it's [low reading scores] because you strayed away from the curriculum.'*” Several teachers expressed this sentiment.

Curriculum pacing guide thwarted student engagement

The heavily scripted curriculum that relied on lengthy whole-group phonics lessons went against many guiding principles of ML literacy instruction. One teacher noted, “*The curriculum chosen by the district....doesn't match what we are or what we learned about how to best serve MLs.*” Another teacher shared, “*It's not very interactive, and it's not very hands-on. And I've noticed that many [MLs] shut down because of that.*” Teachers expressed limited autonomy to add engaging and culturally responsive student learning experiences, such as storytelling, art projects, stations, etc. The requirement of strict fidelity to the curriculum made teachers feel they would be penalized for voicing their concerns about the curriculum.

Limited Opportunities for Writing

Teachers expressed concerns about students' limited opportunities for writing. While the curricula focused on dictation (e.g., “listen carefully to the sound 'ch' and write down the letters

that make that sound”) during phonics instruction, there were concerns about students' long-term academic outcomes around writing. One teacher stated,

“The curriculum had very little writing throughout the whole year. It was mostly just trace the letter, maybe trace one word to go along with it... At the end of the year... we started our last unit, and [the curriculum asked for students] ...to write a narrative paragraph, and we had never instructed them how to write a whole sentence.”

There did not appear to be enough time to teach other aspects of writing, as stated in the K-12 ELA standards (e.g., 1.2.2.1, “write routinely for various purposes and disciplines, representing one’s own personal perspective, identity, and voice”).

Limitations

This study occurred in one elementary school with one of many SoR-informed curricular options. Schools using different SoR-informed curricula or implementing curricula differently may have varied experiences. However, research shows that Sunnyside is not alone in experiencing a disconnect between teachers’ positive reception to reading training and their struggles with curricula branded “SoR-informed” (e.g., Escamilla & Strong, 2024). Finally, it is noteworthy that Sunnyside was an early adopter of SoR-informed curricula, and therefore, teachers were required to maintain fidelity in their implementation during this first year.

Discussion and future directions

Sunnyside teachers’ concerns about SoR-informed curricula and their implementation are not isolated. Recently, Escamilla and Strong (2024) surveyed teachers across 21 states and found that teachers questioned their ability to uphold their instruction for MLs due to the narrowed focus on phonics in the newly implemented curriculum. More attention must be paid to the learning needs of MLs and schools must center curriculum choices on the student populations they serve. Curriculum must be thoroughly vetted for the literacy practices we know to be supportive and necessary for MLs.

Sunnyside was part of a district that began implementation efforts ahead of many other districts. During this process, some teachers at Sunnyside identified disadvantages both in the SoR-informed curricula chosen by their district and in its implementation. Similarly, critics and supporters of SoR mandates across the country have raised concerns about uneven and rushed implementation (Schwartz, 2022). In April 2024, the California Teachers Association objected to a bill mandating the Science of Reading in California schools, in part because the bill cuts teachers out of the critical decision-making process, especially on curriculum (Langreo, 2024). Woulfin and Gabriel (2020) advocate that “as practices evolve to support educators’ understandings of the appropriate use of reading curricula and instructional materials, the role of curricula in supporting the SoR should be viewed as an area for inquiry rather than a foregone conclusion” (p. 11). Importantly, school leaders must take into account the perspectives of teachers on the front lines.

We must be as intentional about the science of *teaching* as we are about the science of reading (Shanahan, 2020). More research is needed around the specific teaching practices encompassing

the science of reading (Seidenberg, Cooper Borkenhagen, & Kearns, 2020). If school leaders expect that student reading outcomes will change, they must accompany the implementation of the new curriculum with a careful and strategic professional development approach that is evidence-based and includes ongoing assessment to understand how teachers and students are experiencing the new curriculum (Reed, 2024). Teachers of MLs must be consulted in that ongoing assessment.

Finally, it is incumbent upon the research community and school leaders to investigate trending approaches to literacy instruction. As more states pass SoR policies to shift reading instruction, we must learn from studies like this one about the importance of listening to and learning from teachers, especially those who serve MLs. Many obstacles influence the implementation of a new curriculum, “such as ambiguity in policies, guidance, and materials, lack of resources for learning about change, and conflicting priorities and pressures” (Woulfin & Gabriel, 2022, p. 326) and all of these factors should be further examined in future studies.

Now, in the second year of our research, we see signs of a more hopeful literacy experience for MLs and all students. We have observed increased teacher agency, resulting in more supportive, individualized, and engaging literacy experiences for students. We continue to gather more data about how SoR-informed literacy instruction is evolving at this school. More studies like ours are needed to explore how teachers are experiencing their SoR-informed reading training and enacting evidence-based literacy instruction focused on MLs’ needs.

References

- Baker, S., Lesaux, N., Jayanthi, M., Dimino, J., Proctor, C., Morris, J., Gersten, R., Haymond, K., Kieffer, M., Linan-Thompson, S., & Newman-Gonchar, R. (2014). Teaching academic content and literacy to English learners in elementary and middle school (NCEE No. 2014–4012). *U.S. Department of Education, Institute of Education Sciences, National Center for Education Evaluation and Regional Assistance*. Retrieved January 30, 2020, from <https://ies.ed.gov/ncee/wwc/PracticeGuide/19>
- Escamilla, K., & Strong, K. (2024). Voices from the field: Impact of the implementation of the science of reading instruction and policy on emergent bilingual/English learner literacy programs and teachers. *National Committee on Effective Literacy*. <https://multilingualliteracy.org/>
- Goldenberg, C. (2020). Reading wars, reading science, and English learners. *Reading Research Quarterly*, 55(S1), S131–S144. <https://doi.org/10.1002/rrq.340>
- Hwang, H., & Duke, N. K. (2020). Content counts and motivation matters: Reading comprehension in third-grade students who are English learners. *AERA Open*, 6(1), 2332858419899075. <https://doi.org/10.1177/2332858419899075>
- Kittle, J. M., Amendum, S. J., & Budde, C. M. (2024). What does research say about the science of reading for K-5 multilingual learners? A systematic review of systematic reviews. *Educational Psychology Review*, 36(4), 108. <https://doi.org/10.1007/s10648-024-09942-6>
- Langreo, L. (2024, April 17). For now, California won't mandate 'science of reading.' Here's what happened. *EdWeek*. <https://www.edweek.org/teaching-learning/for-now-california-wont-mandate-science-of-reading-heres-what-happened/2024/04>
- Lesaux, N. K., & Siegel, L. S. (2003). The development of reading in children who speak English as a second language. *Developmental Psychology*, 39, 1005–1019. <https://doi.org/10.1037/0012-1649.39.6.1005>
- Merriam, S. B. (1998). *Qualitative research and case study applications in education*. Jossey-Bass Publishers.
- Neuman, S., Quintero, E. & Reist, K. (2023). *Reading reform across america: A survey of state legislation*. Shanker Institute. <https://www.shankerinstitute.org/read>
- Olsen, L. (2022). Comprehensive literacy instruction for English language learners. <https://www.multilingualliteracy.org>
- Reed, D. K. (2024). Redesigning the core literacy block: A two-year evaluation study. *Reading & Writing Quarterly*, 40(3), 286-301. <https://doi.org/10.1080/10573569.2023.2190326>
- Schwartz, S. (2022, July 20). Why putting the 'science of reading' into practice is so challenging. *EdWeek*. <https://www.edweek.org/teaching-learning/why-putting-the-science-of-reading-into-practice-is-so-challenging/2022/07>

Seidenberg, M. S., Cooper Borkenhagen, M., & Kearns, D. M. (2020). Lost in translation? Challenges in connecting reading science and educational practice. *Reading Research Quarterly*, 55, S119-S130.

Shanahan, T. (2020). What Constitutes a Science of Reading Instruction? *Reading Research Quarterly*, 55(S1), S235-S247. <https://doi.org/10.1002/rrq.349>

Woulfin, S., & Gabriel, R. E. (2020). Interconnected infrastructure for improving reading instruction. *Reading Research Quarterly*, 55(S1), S109-S117. <https://doi.org/10.1002/rrq.339>

Yin, R. K. (2018). *Case study research and applications: Design and methods* (6th ed.). SAGE.

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