TEACHER LESSON STRUCTURE AND UPTAKE OF INSTRUCTIONAL NUDGES

Maria Nielsen Stewart
University of Missouri - Columbia
mntkd@umsystem.edu

Amber Candela
University of Missouri – St. Louis
candelaa@umsl.edu

F. Paul Wonsavage
University of Florida
wonsavagef@coe.ufl.edu

Mitchelle Wambua
Washington University in St. Louis
wambuamitchelle@gmail.com

Zandra de Araujo
University of Florida
zdearaujo@coe.ufl.edu

Samuel Otten
University of Missouri – Columbia
ottensa@missouri.edu

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Teachers often have discretion in how they format their lessons (e.g., whole-class, groups), even if they are required to use specific textbooks, technology, or common assessments. Additionally, teachers have a choice in using combinations of whole-class discourse, independent, or group work time to engage students in mathematics (Otten et al., 2022). We hypothesize professional developers need to be cognizant of teachers' lesson formats when offering instructional suggestions. For example, if a teacher does not use group work regularly, they may be hesitant to implement interventions designed for group work. These suggestions should be close to teachers' current practices, small in grain size, and be something a teacher could easily take up (Litke, 2020; Star, 2016). We asked, how do teachers' lesson formats impact how they take up instructional nudges provided in a professional development setting?

We observed seven Algebra I teachers' lesson formats as part of a larger study (Candela et al., 2024). We utilized Year 1 observations to identify the percent of time dedicated to whole-class discourse, independent work, and group work. In Year 2 we deployed 16 instructional nudges that are small instructional suggestions, closely aligned to teachers' practices, and have potential to be high uptake (Authors). We aligned the design of the instructional nudges with different lesson formats. For example, One Paper is an instructional nudge that encourages a teacher to use group work and Rate and Review is designed for independent work time where students rate responses to worked problems, much like they would reviewing a product. Teachers selected instructional nudges and we used observations and interviews to capture which one's teachers enacted.

We identified relationships between the time spent in each lesson format and the instructional nudges enacted. One teachers' instruction was typically whole-class discourse, short independent work time, more whole-class discourse, and finally independent work time. This teacher only implemented instructional nudges that fit in during whole-class discourse, and as the teacher spent most of their class time in this format, it follows they would take up nudges that fit in this format. This finding was similar across teachers. We will share visual displays of our results for all teachers and discuss the instructional nudges with the most uptake in relation to format. Implications suggest teachers are more likely to take up practices that are more closely aligned with their current practices and suggest those providing professional development should keep this in mind when planning interventions.

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