Overview

The public dialogue around U.S. education is one of crisis and decline. Yet the opportunities for delivering high-quality learning experiences are greater than ever. In particular, there is a great deal of research on learning, motivation, and teaching available today to guide effective curriculum design and pedagogy. In addition, modern technologies like the iPad and Web enable new modes of teacher-student interaction that can support students to progress at their own pace while freeing up teachers to provide more individualized attention to each of them. Importantly, these innovations can be integrated into today’s classrooms and/or lesson plans, without the need for extensive retooling or retraining.

In this session, we will explore these possibilities together, using a specific iPad app called Native Numbers as a concrete case study of how all of the necessary elements can be brought together now to support effective learning and teaching. Native Numbers itself is most appropriate for children in grades K-2, with possible applications for children in grades 3-5 who struggle in math. The underlying design principles we will discuss, however, are very general; they are relevant across all subject areas and grade levels.

The session will begin with a brief overview of the app development process, followed by a tour (both guided and individual) of the app, and conclude with a conversation about next steps (new research, conversations, and future apps).