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This paper introduces Wordcraft, a new interactive tablet application that allows children to explore sentence structures and their meanings. Wordcraft uses a constructionist design: children manipulate word cards to build sentences which, when grammatically well formed, come to life in a storybook-like animated world to illustrate their meaning. Such visual feedback helps children play with parts of speech and understand how they fit together to form grammatically correct sentences. Preliminary studies of the use of Wordcraft by 17 children between the ages of 4 and 8 suggest that children were able to observe how different sentence constructions result in different meanings and encouraged children to engage in metalinguistic discourse, especially when playing the game with another child.

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The educational psychologists Neumann Neumann (2014) write that touchscreen interfaces are increasingly being used in the home and educational settings by young children, and the finger-operated tactile affordances of tablets may support pre-schoolers educational development in domains such as literacy. They also note the need for more research into how to scaffold language learning in this new design space.

Wordcraft is an interactive tablet application that lets children build sentences and get immediate visual feedback. Wordcraft employs the constructionist approach to learning to encourage children to explore ideas while learning with the interface. It allows children to build a sentence incrementally, using immediate visual feedback of how their manipulations affect an animated scene to gain an understanding of how different parts of speech can impact overall sentence structure.

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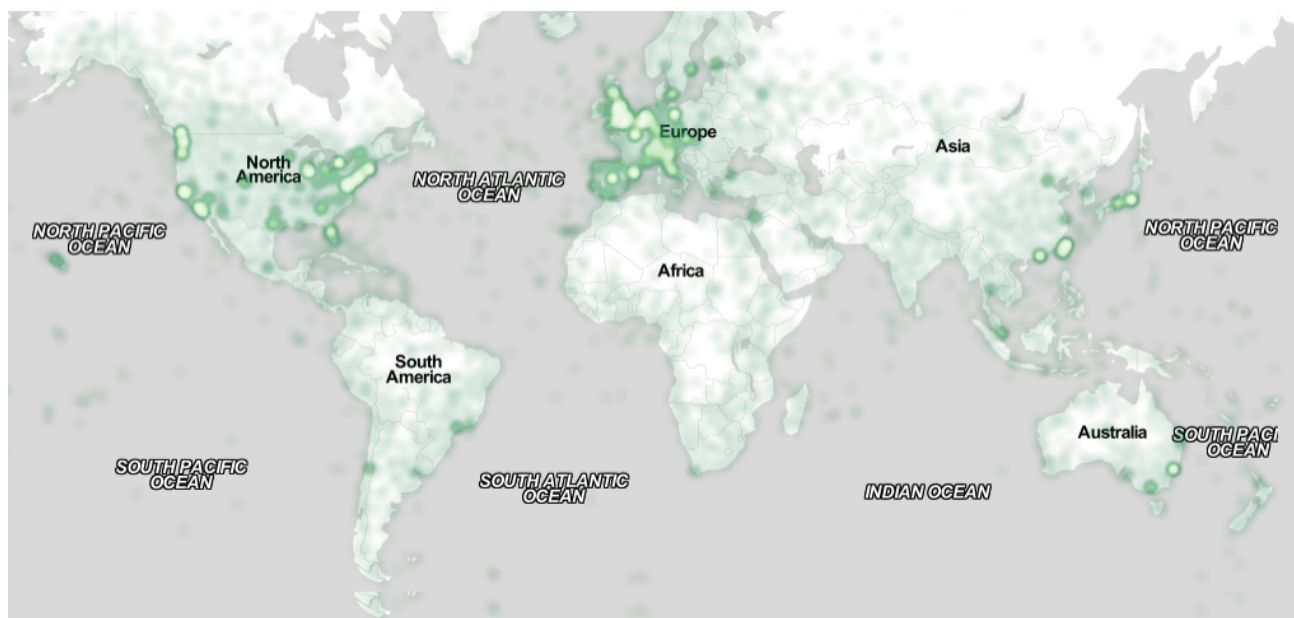


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