

The Impact of an Interactive E-Book on Mathematics Reading and Spatial Ability in Middle School Students

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Abstract : Mathematics reading and spatial ability are important learning components in mathematics education. However, many students struggle to understand real-world problems and lack the spatial ability to form internal imagery. To cope with this problem, in this study, an interactive e-book was developed. The result indicated that both groups had a significant increase in the mathematics reading ability test, and a significant difference was observed in the overall mathematics reading score in favor of the experimental group. In addition, the interactive e-book learning mode had significant impacts on students' spatial ability. It was also found that the richness of content with visual and interactive elements provided in the interactive e-book enhanced students' satisfaction with the teaching material.

Keywords : interactive e-books, spatial ability, mathematics reading, satisfaction, three view

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