# Old Tests and New Curricula:

## Can old assessment structures measure achievement in the digital mathematics curriculum?

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From the classroom teacher's perspective, much of the impact that computers have on the teaching and learning of mathematics derives from the use of the graphics. These enable us to share dynamic mental images 'that have been held static in the pages of textbooks for over 2000 years'*. Students' understanding of all areas of mathematics can be greatly enhanced by the effective use of a growing range of mathematical software packages.

But our focus, as test developers, is not on how mathematics is taught, but on what is taught. Do students who study mathematics in an ICT-rich environment actually learn something *different* from those who follow a totally print-based curriculum? If so, then how does assessment need to change to take account of and support this new digital curriculum?

This paper will describe some of the outcomes of an ongoing study of the possible effects of a selection of primary and early secondary mathematics teaching software on the development of students' mathematical concepts, and to identify some implications of this for assessment.

*Kate Mackrell and Peter Johnston-Wilder (2005), *Thinking Geometrically*. In Sue Johnston-Wilder and David Pimm (eds): **Teaching Secondary Mathematics with ICT**. Open University Press.