CETL-MSOR Conference 2015

Madonna Herron: The educational uses of pencasts in maths education.

A pencast solution is an interactive document containing a digital version of a solution to a maths problem that is synchronised with audio recorded in that moment in time. Using a Livescribe smartpen, an earlier trial project used a limited number of pencasts to provide revision support to first year students on an Engineering Mathematics module at Ulster University. The students that used the pencasts found them extremely helpful. More extensive work and 100 plus pencasts later, several educational benefits of pencasts have been identified and are outlined in this report.

The students' educational usage of the pencasts is discussed in the context of first year Engineering Mathematics and Mathematical Methods modules. The equipment and workflow used, their benefits and limitations are also described.

Results from a recent student survey indicate that the pencasts are very helpful. This presentation will discuss the findings from this survey, and report on the feedback received from the students who were given access to the pencasts.