

PROJECT *e-scape*: A WEB-BASED APPROACH TO DESIGN & TECHNOLOGY LEARNING AND ASSESSMENT.

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Abstract

This project concerns the design of a digital approach to portfolio assessment of student performance, initially in design & technology. Learning activities in design & technology are increasingly influenced by digital technology, particularly through the use of CAD systems (for product development) and digital photography (for recording). Nevertheless, the final presentation of work – e.g. for GCSE assessment - is almost entirely paper-based, using print-outs of this digital work.

Project e-scape (e-solutions for creative assessment in portfolio environments) involves a dramatic development from this position. Learners work on assessment tasks in normal design studios and workshops, designing & developing products. Rather than working on paper, they using PDAs as digital sketchbooks, notebooks, cameras, and voice recorders and their resulting portfolio automatically emerges in a secure web-space. This virtual portfolio develops through the 6 hr activity and can be viewed alongside their real material modelling of prototypes. Once completed, the portfolios can be accessed remotely by Awarding Body moderators. The work involves new approaches to assessment and supports the development of new learning and teaching strategies in design & technology.

The project has been designed in 3 phases, initially (phase 1) exploring the creative potential of a wide range of digital technologies to establish a proof of concept which was completed in Aug 2004. In phase 2 we produced a working prototype system which has been trialled in 14 schools throughout England, resulting in 250 digital portfolios in the website. In the phase 3 we plan to consolidate the prototype into a system that can be scaled up for use not only in d&t but across all subjects where aspects of active learning

As the project moves into phase 3, we are exploring the issues arising from the operation of the prototype in the national pilot for phase 2. Key issues have emerged concerning new approaches to classroom activity, new approaches to the assessment of performance, and new potentials arising out of the rapidly developing power of hand-held digital tools.