**The NMC Horizon Report: 2012 Higher Education Edition. Austin, Texas: The New Media Consortium.**

**Horizon Report, Tablet Computing**

This article considers Tablet computers, examining many of the features and functionality that makes them ideal instruments in a teaching and learning environment. The authors argue that tablets are a new technology and differ from laptops and tabletPCs in a fundamental manner, and in doing so offer new prospects to enrich teaching and learning using methods that were previously inconceivable.

The article places tablet computing in a timeframe of one year or less, this contention is supported by statistical evidence corroborating that iPad accounts for 97% of all tablet-based web traffic in America and 47% of all mobile web traffic.

There lightweight and portable design makes them ideal for work in the field, allowing researchers and scientists to carry portable computing to previously remote and inaccessible locations. They incorporate many of the utilities of a laptop but with greater portability (NMC. 2012). Tablets have evolved from technologies associated with smartphone’s therefore they have the ability to download the full range of mobile applications, they employ built in sensors which allow for location awareness. Applications for tablets are cheap to buy and easy to attach. The article explains that there portability makes them ideal for fieldwork; the large screen can automatically adjusts its positioning making it easier to share downloaded content from a variety of sources. File sharing of images, text, videos, email, web browsers and two-way video phones are also a feature of tablet computers. There versatility is further boosted as some models have the option of using solar power where no mains electricity is available. These characteristics make this type of computing ideal for the progression of mLearning and the dissemination of mScience in developing countries.

Budgetary constraints are currently a major concern, with many educational bodies facing value for money issues that have to be addressed when introducing new technology. This must be measured against the savings possible in student retention (by employing prior learning initiatives and using campus and course familiarisation and visualisation apps), use of less traditional textbooks and more efficient dissemination of information. Security issues would have to be addressed, when providing tablets to students both in terms of device security and guidelines on suitability of materials that can be downloaded. The on screen keyboard can be difficult to master, especially to those used to a traditional keyboard layout.

The article suggests that the success and popularity of tablets is due to a combination of factors, there effortlessness interface for social networking, web browsing, downloading apps, and the large screen size with high definition graphics make them ideal for reading. Therefore allowing tablets to become a very important market in the distribution of eBooks and magazines, this joined with a camera and video player allow for a very versatile device for learning and education. A good example of how tablets are used in practice is described using the a lecture capture app called “Tegrity” which allows students to watch classes from remote locations, record classes, or review on-demand.

In terms of my own practice, I can envisage the usefulness of online learning resources such as MathsCasts, which provides a Maths Learning Centre with Online Support; this can take the form of narrated screen video recordings explaining mathematical concepts. “These resources are produced by the mathematics support centres at Swinburne University of Technology, The University of Limerick and Loughborough University. They are part of an on-going collaborative research project to develop high quality resources and investigate the effectiveness of MathsCasts to support mathematics learning” (Mathcasts. 2012). The participating student receives a tablet or iPad device preloaded with material, in the case of MathsCasts a comprehensive list of subject materials is provided covering wide-ranging areas in Maths and Statistics. In reference to my own practice this would alleviate the need for a large amount of photocopied worksheets, textbooks, and make it much easier to display material using a projector or interactive whiteboard allowing me to employ more interesting and novel ways to visualise concepts especially in Geometry and Co-ordinate Geometry.

**Reference:**

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Mathcasts. Creative Commons Licence (2012). Accessed July 2012 www.mathscasts.org/find\_a\_mathscast.html