Conference Report by Elisabet Weedon: Cal2003

This conference took place at Queens University in Belfast $8^{th} - 10^{th}$ April, 2003. Its focus is on the use of ICT in education – CAL stands for computer assisted learning. This conference takes place every other year.

There were three keynote speeches. The first one, by Mike Sharples of Birmingham University, focused on mobile learning technology. It gave an interesting overview of what mobile technology might offer in terms of enabling learning. It also considered the term 'learning' and suggested that learning takes place in a range of places – not just schools. It reported on a study where the participants had been asked to note how they used technology that in some way or another had involved them in learning. This presentation outlined what can be done differently with this type of technology:

- New patterns of collaboration
- It can provide context sensitive learning (e.g. Tate Modern multimedia)
- It can provide 'mixed reality' link up real with virtual world
- It can connect learning to everyday life
- It can provide mobile learning services
- It can provide conversational learning (e.g. BBC online teacher query line)

Problems with the technology were identified as:

- Battery life
- Portability
- Access
- Ownership of technology and materials
- Disruption to classroom teaching

The second keynote came from Ros Sutherland of Bristol University. She reported on a large scale study, ESRC funded, which looks at the use of ICT in schools. This study involves teachers and researchers working in partnership with each other. Teachers are involved at the outset in identifying aspects of the curriculum that they wish to work on. The researchers then work with the teachers in developing a particular topic in relation to theory and also in evaluating the impact of the intervention. The research is longitudinal and it also considers issues in relation to implementation of ICT and management of ICT in schools.

The final keynote speech came from Andrea di Sessa from Berkerly, California. He has worked with Seymour Papert (famous for Logo). His keynote explained how computers can be used to develop children's thinking skills. His talk was interesting and well presented but unfortunately his examples were rather old (10 years - a long time in computer technology!). This meant that some of the other presentations were showing more up to date equipment and more exciting activities for children.

The remainder of the conference presentations were organised around a set of five themes. There were three presentations/hour for each of the themes .. so choice became a problem! Each presentation was only allowed 20 minutes (15 minutes for presentation, 5 for questions - few presenters managed to stick to this!). Information overload was setting in at the end of the day! What is reported on below is therefore only a selection of the presentations. There was quite a range of presentations and the quality varied considerably.

Tuesday's presentations that I attended included the following:

The first set focused on the use of computers for younger children. The first presentations raised the interesting issue of the impact of the visual during the writing process when work is being word-

processed. It suggested that many children had become obsessed with the visual (e.g. font type and size) rather than with the actual content of the writing. Teachers viewed this as problematic but the presenters of this paper suggested that perhaps we have to revisit the way that we view the writing process. Perhaps this is also something that should be taken into account in developing study skills materials on the writing process?

A second session this day focused on building online communities of practice. It was presented by an Australian researcher who is involved in running workshops on the development of communities of practice. She questioned the general use of 'communities of practice' and argued that term was often used inappropriately. Details were provided of a website that would allow those who were interested in finding out more to follow up: <u>http://www.cpsquare.com/edu/foundations/index.htm</u>. The presentation provided both interesting ideas to be followed up and food for thought. The issues raised here are clearly of importance for our development of modules that are delivered fully online.

A special session (hour long) reporting on the government sponsored research into the relationship between ICT and achievement in schools (ImpaCT2). This study was carried out by a team of researchers led by Professor Colin Harrison at Nottingham University. It used both qualitative and quantitative methods. It provided interesting insights on the relationship between ICT and specific subject areas. One particular aspect of this report was its insights into children use of computers at home. This study linked to the Bristol research could provide valuable materials for BACYS students at level 3.

The final session on the Tuesday was intriguingly named: 'Zen and the art of web site evaluation'. It reported on a study at Dublin Institute of Technology. It argued that evaluation of websites should consider the following four main categories: Content, Form, Technical Features and Authority. The importance of each of these categories had been evaluated by third level computing students. Content and Form (layout etc) featured high as important factors for these students; however, Technical features (except for download times) and Authority were not considered of importance. An important issue here is the lack of emphasis on Authority. This term was used to consider the reliability and validity of sources, an issue that is vital if students are to use information from the internet. The lack of importance attached to Authority is worrying in relation to students' use of the internet for information. This clearly links into the way that our students use sources on the – we maybe need to consider how we develop skills in evaluating internet information more effectively.

The Wednesday sessions started with a presentation on online assessment. This was a report on the delivery of a particular module and the attempts to augment the face to face delivery with online delivery and also online assessments. It used Bloom's taxonomy to develop specific criteria for the assessments. There was a deliberate link between learning outcomes and Bloom's taxonomy that was then linked into the teaching and learning. The findings suggested that it was easier to assess online the lower levels of Bloom's taxonomy than the higher levels. It was therefore suggested that it was not feasible to computerise existing assignments – but that new ones had to be created. The presentation also emphasised that Bloom's taxonomy did not cover the assessment of skills.

An Australian presenter provided a presentation with a different emphasis. She outlined the development of a tool 'Thinking Well' based on Vygotskian principles which aims to scaffold pupils thinking skills in synchronous (classroom based) communication. Pupils work (in groups of around 4) with an individual keyboard linked to a computer. This allows them to produce joint documents. These documents may be shared pieces of writing or responses to preset questions within a specific topic area. The computer has internet links so when dealing with a specific question the pupils can access the internet for further information. A fascinating demonstration of how ICT can enhance learning!

The final Wednesday session reported on here is one that explored the use of learning styles when developing learning materials. The researcher used the Myer Briggs questionnaire (more of personality inventory perhaps?) but indicated what type of learning materials would be most useful to those of a particular profile. This presentation is written up as a paper and will be submitted to the journal

associated with the conference and the presenter will also forward a copy to me - so if anybody is interested please get in touch.

The Thursday sessions were fewer in number as the conference finished with a keynote speech after lunch. Jane Seale of Southampton provided an interesting presentation on the issues around internet use by students with learning disabilities. A draft paper was provided (and my copy has been forwarded to a colleague who is working with students with learning disabilities).

A presentation from Sheffield University by Sheena Banks demonstrated the development of an online Research Methods module for beginning educational researchers. It incorporated some effective use of audio and video that allowed the students listen to a range of different accounts from different researchers. Sheffield University has an excellent website devoted to networked learning – www.shef.ac.uk/collaborate.

There is further information on this conference at <u>www.cal2003.com</u> and I have a copy of the abstracts. The conference was well organised and stimulating; however, the focus was mainly on school based use of ICT and it is therefore the most relevant conference for those interested in ICT in Higher Education. However, the conference the conference is clearly relevant to anybody involved in education at the primary and secondary level – and perhaps therefore of interest to those involved with BA Child and Youth Studies and associated programmes in education and childcare. It did also provide an opportunity to present a paper and an opportunity for a considerable amount of networking. Links have been made with a researcher at Sheffield University, Dublin Institute of Technology and Lehigh Institute in Pennsylvania. Presentations and papers have been forwarded to colleagues on the MAPD programme and the sessions on ICT (Colin Harrison and Ros Sutherland) could provide useful materials for Applied Social Research at level 3 (especially for BACYS students)