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STAFF EDUCATION – LEARNING ABOUT ONLINE ASSESSMENT, ONLINE

David Walker, Margaret Adamson and Richard Parsons

Staff Education – Learning about Online Assessment, Online

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Abstract

Over the last eighteen months, the University of Dundee has developed a stable and resilient central Computer Aided Assessment (CAA) system to support student and staff use of online assessment. We recognise six key components to this system: quality software, quality hardware, clear policy and procedures, adequate central staffing support, integration with other online learning systems, and staff education. This paper will focus on our central approach to staff education.

The online assessment system was designed and constructed with the guidance and cooperation of many staff members, most of whom had previous experience with computer-based assessments. With the physical systems in place, we initially deployed a conventional staff development programme predominantly based on face-to-face sessions. Feedback from these sessions encouraged us to revise our approach, in order to reflect the complexity of the subject area, and the diverse needs of the target audience. Consequently, we have now largely replaced these sessions with a more comprehensive and interactive course, delivered online using our Blackboard Virtual Learning Environment (VLE) and Questionmark Perception (QMP). The course, *Assessment Online*, has run on four occasions, equipping over 60 staff members with the tools and skills necessary to design and deliver valid and reliable online assessments. Along this path the course instructors have learned a number of valuable lessons which have, in themselves, resulted in many enhancements to the way the course is delivered. Significantly, as a result of its early success, the 5 week course has now been formally accredited by the University's Faculty of Education and Social Work and will run biannually.

Introduction - Course Approach

Assessment Online is a demanding course which follows two key streams:

1. the pedagogy of assessment in an online environment
2. the technicalities of authoring and delivering assessments online

Most of the technical instruction is completed using Questionmark Perception software as the primary example. The decision to deliver the course online was borne out of staff feedback that the traditional face-to-face sessions were too intense and recognition that the best place to teach online assessment is online. This view is endorsed by Collis and Moonen (2002) who argue that, "…staff development is effective when carried out in a context meaningful to the instructor" (p. 63). Typically participants spend about 5 hours each week on the course material but it is emphasised that this may vary depending on individual familiarity with the subject. Crucially, it is recognised that all participants will have relevant experience to share and much to learn about online assessment. On completion of the course participants are then well prepared to assess their students online. The course is open to staff from other institutions, and has attracted interest from across Britain and as far a field as Singapore.

The core material and assignments are delivered entirely online via Blackboard, the course runs for a five week period each semester and is led by elearning professionals from the University's Learning Enhancement Unit with input from academic staff with significant experience in the field, adding a 'practitioner's perspective'. Course materials and assignments are released to participants sequentially on a weekly basis facilitating a progressive build-up of knowledge and skills. The course is driven by participation and sustained activity by those undertaking it. The activities presented to course members are designed to be as authentic as possible and centre on application for use in practice. Collaboration and reflection are encouraged throughout. While this approach may be described as constructivist, the aim was never to follow a prescribed theory or advance any new pedagogy. Our view is similar to that asserted by Mayes (2001) who states that: "…it is not new pedagogies that we need, but new ways of providing existing pedagogy efficiently and flexibly." (p.17)

The course focuses on the following topics:

- aspects of good question and assessment design
- authoring questions and assessments
- mechanisms for successfully delivering online assessment
- introduction to self and peer assessment
- analysis of answers – the importance of assessment data
- complexity within assessments

Typically three assignments are to be completed each week which let participants put their new skills into practice. Participant's tryout online assessments as students and are encouraged to appraise the quality of questions, feedback and assessment design. Other assignments focus on group discussions on issues critical to the effective use of online assessment and the production of actual short assessments related to their area of expertise. The course ends with a final single attempt exam based on the

course learning outcomes and an online feedback system for collecting participant views on the course overall.

Learning Curve

Since the courses conception we, as the course developers and teaching team, have learned many lessons and gained a greater understanding of the techniques required to deliver staff education online. The key messages we have learnt from running *Assessment Online* are that:

- Used appropriately, the online environment is an excellent medium for promoting learning. It is well suited to supporting different skill levels, although care is required in course design to meet this aim.
- Interaction and collaboration are key learning tools.
- Participants can teach themselves advanced question design and innovation particularly through group work.
- There is a need for constant development and refinement of the course, particularly in relation to staff and student needs.
- Staff can act just like students when faced with the demands of coursework.

The second time the course ran we had approximately forty members of staff enrolled and this proved to be cumbersome and difficult to manage resulting in fragmented discussion and many participants dropping out. Consequently we have now limited the course to a maximum of twenty people (average of 15) which has proven much more manageable and from the participant's perspective, makes it easier to interact and, as a result, develop relationships with their peers. We have identified a greater need to be more upfront about the level of commitment needed, not to necessarily complete the course, but to sufficiently grasp the concepts and skills introduced during the course. We will continue to monitor whether future participants find this problematic and will alter our guidance and course material as appropriate. The course is fast becoming a high priority staff education programme within the University, thanks in large to its combination of attainable objectives, flexible mode of delivery and fluid structure which allows it to adapt to changing needs (Moore 1995).

The lessons we have learned in relation to staff participation have perhaps been the most enlightening. Initially we adopted a laid back approach to deadlines and completion of activities but this has proven inefficient and unpopular. This approach frequently resulted in non-submission, staff falling behind the rest of the group and ultimately instances of people dropping out. We have since adopted a flexible but firm attitude. Subsequent participants appear to have liked the enforced structure of deadlines and targets which have proven highly motivational on an individual and peer-to-peer basis. In relation to the information presented on question and assessment design, something very important that we learnt very quickly was that academic staff

have the best understanding of what will work for students within their subject area.

Staff as Students

Although the course is designed for staff education, it is intriguing how quickly participants slip back into student ways. In staff education courses recognition of the respective roles of participant and instructor is initially difficult and should be confronted at the outset. At the beginning it is made clear what is expected of the participants but to begin the dialogue, participants are encouraged to feedback whether they feel these expectations are realistic and acceptable. During the course regular emails and telephone conversations are frequently required to motivate staff members and fill them with the belief that they can grasp the often difficult and technical aspects of online assessment which may be completely new to them. Requests for extensions are also frequent occurrences and, while usually granted by the instructors, tight new submission deadlines are set reflecting the flexible but firm philosophy of the course. We are conscious that, unlike the majority of present day university students, many staff find the IT environment challenging. It is therefore important to have realistic expectations and be prepared to offer support where necessary. However, we have found that as staff become more accomplished they gain not only an excellent understanding of online assessment but also first hand experience of elearning from a participant's point of view. During the course we also endeavour to set an example of good practice in relation to how the features of a Blackboard module can be used effectively.

Feedback from a few staff that have completed the course has suggested that they would prefer a more traditional face-to-face approach particularly addressing the more technical aspects of question authoring. This has been addressed through the provision of one-to-one tuition on request. The course includes optional face-to-face introductory and final sessions which adds a human dimension and bridges the gap between traditional and electronic learning.

Evolution of Course

The course continues to be nurtured and developed in line with emerging technologies as well as staff and student needs. From September 2004 the course will continue its evolution as it becomes fully accredited by the University of Dundee's Faculty of Education and Social Work and will award 10 Scotcat points for completion. Assessment criteria have been reviewed and will be made more transparent to participants as they engage with the materials and assignments online. The accreditation of the course is recognition not only of the comprehensive nature of the topics tackled but also that online assessment requires a broader skills base if to be used to its full potential. As Phil Race (2001) eloquently puts it, "…students can survive bad lectures, but they may be damaged by bad assessment." (p.106) In contrast

to traditional staff education courses and the courses previous state which offered "…no particular pay-off…other than increased knowledge", the time and effort expended by participants who engage in the course will be deservedly rewarded. It is also hoped that the accreditation of the course will further add to the credibility of online assessment and maintain its rapid and professional development within the University.

Innovations

Many 'Graduates' of the Assessment Online course have gone on to develop their own online assessments many of which are innovative and have enhanced our student learning experiences. In the last academic year alone over 250 formative type assessments have been delivered and approximately 25 summative type examinations presented to students in a robust and secure environment. Other key examples of use include:

- In Life Sciences, the entire first year Chemistry course was redesigned to be assessed purely online and has resulted in a significant improvement in student performance.
- Text-based exercises in Law to promote research skills and accuracy in citation. Students are given an Act to research, provided with the questions one week before the assessment is presented and then are given a single attempt to submit precise answers based on their research.
- Powerful and complex question design in the medical and life sciences, incorporating calculations, animation and multimedia.
- Drug calculations for Nursing students using randomised numerical values.
- Student-led revision collaboration, using semi-automatic transfers of questions and feedback into revision assessments. Students were given brief lesson on good question design and asked to develop two questions including detailed feedback based on their subject to contribute to a learning bank. Questions were then processed using home-bred tools and imported into Questionmark Perception. In less than three hours over 160 questions were created. These were then reviewed by academics and made available as a revision exercise to students prior to their exam.

Clearly these innovations represent the beginning and we expect future cohorts of staff to engage with the course and continue this innovative process. The course runs twice each year beginning in April and November and is open to staff from other institutions.

Conclusion

The online medium is undoubtedly an effective medium for teaching academic staff the key competencies of online assessment. The course must be

carefully planned and sympathetic to the diverse skills and abilities of the academic staff participants. Those that have completed the Assessment Online course leave with a clear understanding of the technical and pedagogic aspects which underpin online assessment, in particular, the importance of designing questions which not only challenge students but inform and direct their learning. An important outcome of running courses online, perhaps the most important outcome, is that staff gain an appreciation of the mechanics of learning online which will inform their teaching practices in years to come.

References

Collis, B. and Moonen, J. (2002) Flexible Learning in a Digital World. Kogan Page: London.

Mayes, T. in Stephenson, J. (Ed) (2001) Teaching & Learning Online. Kogan Page: London.

Moore, I. in Knight, P. (Ed) (1995) Assessment for Learning in Higher Education. Kogan Page: London.

Race, P. (2001) The Lecturers Toolkit. London: Kogan Page.