

Information literacy skills for nurses: to assess or not to assess.**Alison Gordon****Senior Information Specialist****University of Abertay Dundee a.gordon@abertay.ac.uk****Margaret Forrest, Learning Resources Manager****Andy Jackson, Teaching and Learning Librarian****University of Dundee**

At the Health Libraries Group Conference in July 2006 around 30 delegates came together for a workshop on assessing information literacy skills led by Alison Gordon from University of Abertay Dundee and Margaret Forrest and Andy Jackson from Dundee University. Andy and Alison are members of SCURL (Scottish Confederation of University and Research Libraries) Health Librarians Group and were keen to work together on a workshop on information literacy.

Why did we choose assessment as a topic? At Abertay we have been considering assessment and the effect it might have on student participation in and commitment to information literacy classes and I had been working with nursing lecturers to try to implement this. Margaret had done a small scale study of assessment of information literacy skills at Dundee University so she joined us to prepare for the workshop.

Abertay has had a Library Information Skills Programme since the early 1990s and a basic IT and library skills module had been taught to all first year students from 1998. In 2003 it was decided that these needed to be rethought. The IT skills module had become out of touch with the needs of first

year students. Additionally, the re-think was driven by the revision of the University's modular scheme; problems with plagiarism and over-reliance on internet materials identified by external examiners; and a recognition that employers are looking for graduates with information literacy skills.

After consultation with the academic Schools we wrote a concept paper (Gordon, et al. 2003) laying out the rationale for introducing an information literacy framework, integrated into all subject programmes and delivered as and when required for the specific programme. In 2004 this was approved by Senate and indicative content detailed for baseline, intermediate and advanced skills. The framework is based on the Society of College, National and University Libraries seven pillars of information literacy (Sconul 2003) which identify and demonstrate the development of skills from novice - the level at which a student might enter university, through competent, to expert - the level which might be expected from research students. The framework was implemented for session 2004-2005.

Our review of the first year identified that attendance was a problem for information literacy classes. From informal feedback from students, we know there is a feeling that they learn all they need to know in first year, and that classes in later years will give them nothing new. We also suspect that many students choose not to attend classes because of the lack of assessment.

Until now information literacy skills have not been explicitly assessed at Abertay, except in the basic IT skills model referred to above. However, increasingly lecturers are seeking to add an element of assessment of information literacy skills to their subject assessments.

During session 2005-06 a formative assessment of referencing skills was designed for first year nursing students. The students did a diagnostic test first (in class) in the form of an online quiz, were given a mark, and feedback on their answers, again online.

This was followed by a written exercise with instructions to look at the relevant parts of an online tutorial for help to answer the questions. Part of this was in class, but had to be finished in their own time. Feedback was a handout with the correct 'answers', but no mark.

The intention then was that they took the original quiz again. However in spite of email reminders only a small number actually did this, raising the question whether formative assessment on its own is sufficient without also awarding a mark which will count towards a final grade.

Working with this group, consisting of a mixture of mature students and school leavers, gave me the opportunity to prepare an assessment, but also allowed me to discuss with them how they thought assessment of information literacy might be done. The questions I asked were:

- Should the assessment be written, oral, or online?
- Should the assessment be formative or summative? What would be the incentive for students to complete it if the former?
- Should the assessment comprise a series of short tests, or one longer integrated assessment to demonstrate a range of skills?
- Should the assessment be done so that students are able to look up learning materials to help them i.e. forming part of the learning process?
- Should the assessment be an individual or group activity?

My students were in favour of written or online tests and of summative, short tests. They liked the idea of using an assessment as a learning process by being able to use resources such as online tutorials to help them, but were divided on the benefits of individual or group assessment.

For the HLG workshop we arranged and expanded these questions into group activities for discussion. The first workshop activity looked at what information literacy skills should be assessed; what methods or tools could be used to assess; and why assessment should be done.

Participants identified a wide range of skills to be assessed, including referencing and plagiarism, reading list interpretation, critical evaluation, and selecting appropriate search tools. Methods and tools suggested included pre and post questionnaires, essays, observation, annotated bibliography, and search strategy. It was felt that assessment would motivate students, give the training status and academic credibility, allow trainers to review the effectiveness of the training, and help students track their own progress. On the other hand, assessment is resource intensive, and might overlook individual lack of learning.

The second workshop activity looked at designing a simple assessment to measure the skills involved, considering what method to use, why this method was chosen, and whether the assessment should be formative or summative. A brief definition of formative and summative had been given in the introduction to the workshop and can be followed up in e.g. (Morgan 2004, Race, Brown and Smith 2005). Each group had a different topic to design an assessment for.

Those participants who were required to test the ability of students to use a recognised style of referencing correctly, e.g. Harvard style, Vancouver style, etc. suggested an online quiz or worksheet (fast, fun, formative and efficient) or a summative assessment in the form of an essay with a reference list then checking whether citations matched with references.

A second group was asked to test the ability of students to evaluate the quality of information contained in a website. They suggested a qualitative, interactive, formative assessment involving comparing a good and bad website. Alternatively an online quiz could be used, with questions based on looking at quality sites, and defining quality information. This would involve "learning by doing", and could be formative or summative.

The third group were asked to test the ability of students to construct a literature search using basic principles of search design, and also their ability to execute the search. They felt that a portfolio approach to a real assignment would be suitable, with student reflection on the search process and relevance and quality of results (a formative assessment). It would be important to satisfy any learning outcomes for the assignment and could use multiple choice questions in a VLE (Virtual Learning Environment e.g. Blackboard or WebCT) so that marking would be automatic.

The discussion and feedback from the workshop has given us all food for thought, and hopefully stimulated the participants to consider whether and how they might incorporate assessment into their own information literacy teaching.

Here at Abertay we hope to include some of the ideas into our own framework and perhaps do a small scale study on the relationship between attendance, assessment and performance.

Additionally the University is introducing online personal development planning (e-pdp) for all first years from September 2006, and information literacy is one of the elements to be included. We have been developing an online quiz to enable students to measure their skill levels and progression over their time at Abertay, and hope we can use this tool with other students too. And of course the ultimate aim is to develop information literate graduates, so we need to assess in order to confirm for ourselves that what we do is effective.

Reference list

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