Is there a tension between peer interaction and distance or e-learning in Education Studies?

Introduction

Expansion in HE over the last 20 years has resulted in a process where the discourse has changed from the academic to the managerial as institutions have grown and there has been a move from an elite to a mass system (Bathmaker 2003, Jary and Parker 1998). This has resulted in changing perceptions of knowledge (Barnett 1997, Scott 1998) and accountability (Watson 2002) that, combined with a more diverse student population, raises questions about 'taken for granted' assumptions within the system. Traditionally HE has been viewed as the domain of the academic elite whose function is to produce and pass on 'propositional' knowledge. More recently the expansion of HE has inevitably led to systems being adopted that are designed to manage the process. This has influenced not only the way the system is run but also what is perceived as important in terms of knowledge and the content of the curriculum (Trowler 2001). The process of change has, therefore, led to a number of tensions between the need to maintain academic standards on the one hand and the need to manage a mass system of HE on the other. Whilst one of these tensions relates to the nature of knowledge and how it is 'transmitted', there is similarly a tension between the need to maintain academic standards and the desire not to fail large numbers of students (Thompson 2001). These tensions between what may be seen as conflicting outcomes, on the one hand the 'academic' and the other the 'managerial' can be seen in the Government targets and initiatives to widen participation. The need to make HE appealing to a wider audience on the one hand has been set against the need to maintain standards on the other. We have had to stretch the elastic as far as it can go and for many of us there is a feeling that we have almost reached breaking point!

One of the ways in which the elastic has been stretched without breaking, it could be argued, is by making knowledge more accessible through the introduction of electronic resources and virtual learning environments. The growth of e-learning has made information far more easy to obtain in a variety of ways and importantly obtainable almost anywhere (Kehrwald 2005). Whilst this freeing up of information and accessing of knowledge has helped us reach a wider audience, it is not clear whether the process has adequately addressed some of the tensions in the system. Making knowledge more accessible may have helped relieve some of the tension but the question still remains as to how this newly accessible knowledge is acquired and learnt.

Education Studies

As a relatively new subject on university timetables, there is still some debate about what Education Studies actually is. A number of common threads seem to weave their way through the various curricula and we are beginning to see some consensus emerging in the field around, for example, the way in which education is influenced by "the issues and concerns which characterize (educational) policy and practice at the time of study" (Bartlett and Burton 2003, p.6). However, as Bartlett and Burton go on to suggest: "Constructing education studies …is a controversial process" (p.7).

One of the common threads, however, that can be fairly easily identified relates not so much to the knowledge or content of the curriculum but to the way in which it is studied. Part of the move from an elite to a mass system of HE has been a move in emphasis away from only learning propositional knowledge to learning more "process as knowledge" (Barnett 1997), in other words learning 'how' to study and not just 'what' to study. This is evidenced in Education Studies programmes through study skills and research methods modules or units. It is perhaps because it is a relatively

new subject, and is therefore not restricted by a corpus of propositional knowledge, that Education Studies has been not only able to develop this thread but also take advantage of the change in the nature of learning in higher education.

Learning and Teaching

Models of learning and teaching in HE emphasise the importance of the people (students and teachers) in the process. One of the most commonly recognised models is that identified by Biggs (1993) (see figure 1) that is an adaptation of an earlier model taken from the work of Dunkin and Biddle in the 1970s. Based on three stages in learning, presage – process – product, it is a linear progression where the two main presage factors, students and teaching context, lead directly to task processing which in turn leads to the nature of the outcome. However the direction is not all one way as feedback occurs both back through the three stages and more directly back from the outcome to both the teaching context and the student themselves. With both the linear progression and the feedback involved, the whole model represents a system that, at any one time, is in some form of balance but that is also continually changing through time. As change takes place in any part of the model the whole system adjusts, thus the process is a continual attempt to "…strive towards equilibrium" (Biggs 1993, p.76). In a later adaptation (see Biggs 2003) the process element is renamed "Learning Focused Activity" and the concept of deep and surface approaches added to this box, but apart from this the model, as Biggs presents it in 2003 remains the same as his earlier version.

In referring to his model, Biggs suggests that the three sources that might affect the learning outcome, two presage and one process, need to be in constructive alignment with the assessment tasks in order for there to be equilibrium. This sense of

constructive alignment or balanced equilibrium is very important, as without it the chances of students achieving deep approaches to learning are minimal.

Analysing Biggs's model, Meyer (1998) suggests that it: "…has had a profound effect on the manner in which researchers and students alike have thought, and continue to think about individual variation in student learning" (p.51). He goes on to state that:

> There is a timeless attraction in the Biggs model for exploring individual differences in student learning. It represents a conceptually powerful foundation member of an evolving family of interrelated conceptual schemata, or 'mental models of learning'. (p.51)

Exploring individual variations in student learning is a very important part of developing the learning and teaching context. In order to develop a constructive alignment within the three components, and maintain a balanced equilibrium, we have to not only make sure that the outcome matches the task but also that the presage elements (student and teaching contexts) are aligned within the system.

This concept of constructive alignment can be directly applied to the study of Education. If, as mentioned earlier, Education Studies is concerned not just with what is learnt but also with how it is learnt, and as a new subject "process as knowledge" is seen as important (Barnett 1997), then models of learning in HE that analyse the learning process and how learning takes place are of some interest. Furthermore, Education Studies is itself directly concerned with learning and teaching, with concepts of pedagogy and andragogy and with factors that influence learning whether it be with very young children or with adults and students in HE.

Student Perceptions of Learning

The approach adopted by learners is a response to the environment in which the learning takes place (its context), the content of the learning and the way in which

new learning relates to prior learning. All of these affect the approach and therefore the success or failure of the learning process. The approach adopted by students, therefore, is a response to both content and context, as Entwistle (1998) suggests, student learning is:

> …necessarily reactive to the learning context. Students' approaches are affected by their prior educational and personal histories, which produce habitual patterns of studying. However, the content and context of the task evoke strategies which are specific to that particular situation. (p.74)

Approaches to learning are not specific to the individual, as Marton (quoted in Ramsden 2003) explains, they "are not something a student has: they represent what a learning task or set of tasks *is* for the learner" (p.44). Ramsden suggests, therefore, that students are all capable of adopting different strategies dependent upon how they perceive the learning situation.

If, as Entwistle, Marton and Ramsden are suggesting, an individual student's perception their learning is at least as important as the preferred learning style they habitually adopt, then a student's perceptions of the task they are asked to complete will inevitably influence the approach they adopt in completing what they have been asked to do. A task perceived as worthwhile will be valued and the approach adopted will be deeper than one that is less valued where a surface approach taken. At the same time, students will also have general perceptions of the learning process in Higher Education. Perception of task is not restricted to the micro or individual task level but also exists at the macro level of course study. Students do not enter or engage in learning without reference to the bigger picture. They perceive learning not just as an engagement with a particular task or assignment but as the whole process of studying. In this respect it is important to not only think of how students may adopt

deeper approaches to individual tasks, but how they perceive the whole learning process and how we can help them engage more effectively overall.

Research on student perceptions of learning (Somervell 2003) indicates a complex interaction of different factors (see figure 2). The model identifies a group of students' perceptions of the learning process and is based on research carried out in one institution in England. Whilst there is no attempt made by the author to suggest that these perceptions are in any way common to all students, they do represent some themes that may be recognised by those engaged in learning and teaching in HE.

The part of the model that is of particular interest here relates to the field referred to as "Interactions" and in particular perceptions of peer interaction since this had been found statistically significant to students when compared with other forms of interaction. Whilst interacting with others is seen as an important part of the learning process and that interaction with different people at different stages was also important, in particular students seem to value peer interaction over others (Somervell 2003, p.141).

In applying this theory to the concept of constructive alignment, it would appear that making learning as meaningful as we can, and encouraging deeper levels of learning, must involve engaging the students in an interactive process. Interacting with their peers in particular, but also with others (including of course their tutors), becomes highly significant. If, as Biggs (2003) suggests, we are to achieve the most from our students through constructive alignment then, in order to achieve deeper levels of learning, we need to be aware of how students perceive their own learning. Students' perception of the learning experience will determine whether or not deep or achieving strategies are adopted. If they perceive interaction as important then we should make

sure that students are given the opportunity to interact and engage with each other as part of a deep and meaningful learning experience.

Learning at a Distance

One of the ways of widening participation and engaging more students in HE is to develop learning materials that can be studied at a distance. There is considerable pressure on institutions to open up access to an ever wider student population both at home and overseas. As a result we have seen a rapid increase in the use of modern technology as a way of accessing new markets and networked learning emerging as a way of coping with this demand (Kehrwald 2005). However, as Massicotte (1997) suggests, it is not the technology that initially distinguished the difference between what he refers to as the "…two models of dissemination of learning within higher education, the classical and distance learning models" but that "In fact, the most profound difference between the two models is hidden. The classical model is a group model, and the distance learning model is an individual one" (p.4). A similar point is also made by Forrester *et al.*(2005) who suggest that:

> Computer mediated communication has the potential to alleviate the isolation and 'distance' students typically experience by providing a wide range of alternative means of communication with tutors and between students themselves ….At the same time however this form of classroom interaction is unfamiliar to some students (and tutors). (p.294)

As Forrester *et al.* go on to say, the support needed by students involved in distance learning is different from that required by 'traditional' learners. Whilst new technology may aid us in our ability to reach those that may otherwise find it difficult to access HE, and provide ever more sophisticated means of communicating with them and between them, the important difference is not the technology but the means of study and the pedagogy that underpins the difference in practice.

A new pedagogy and approach to learning and teaching students both at a distance and within the more traditional environment is emerging that embraces technological innovation. Although interpreted differently in different places, the concept of 'flexible learning' has been a key initiative in the changing pattern of delivery (McDonald and Postle 1999) and the term 'blended learning' has become synonymous with a mixed method of delivery that embraces both face to face and distance learning. Opportunities would also seem to exist for high quality and sustainable learner support through computer networked learning (Kehrwald 2005). However, what is clear is that all of these changes present a challenge and not inconsiderable staff development and resource implication for institutions.

In addition to the challenge of resource implications, is the concern made earlier over student perceptions of the process and a new constructive alignment that the pedagogy demands. In order to achieve this we have to be aware of the three aspects of presage process and product. The way in which these are aligned in the traditional learning and teaching environment are not likely to be the same as in a distance or blended environment. Similarly the perceptions the students have of the process is also likely to vary and the presage factors (what they bring to the learning experience) will be different. Getting to grips with the demands of the changing pedagogy and developing new ways of constructively aligning the learning experience presents a challenge to the learner, the teacher and the institutional context in which this takes place.

Conclusion

The move from an elite to a mass system of HE, with its associated change in the nature of knowledge and the need to access a more diverse and dispersed group of students, presents challenges to traditional conceptions of learning and teaching. We no longer think of HE solely as the transmission of propositional knowledge. What is

valued as knowledge at this level has changed (Barnett 1997). In addition to the propositional knowledge associated with this new higher education is an equally important emphasis on the process of learning. We are increasingly teaching students how to learn rather than the specific content of the traditional curriculum and this development of 'meta-cognitive' thinking may not be such a bad thing (Biggs 2003). The traditional model of scholarly instruction that is associated with an elitist system of HE has its limitations in a world where such propositional knowledge may no longer be as relevant.

Education Studies has been well placed to take advantage of this change. As a relatively new field of study there has not been the same pressure to protect that corpus of knowledge that exists in some of the more traditional subjects on the university curriculum. Learning how to learn and how to develop research skills are part of the emerging paradigm which emphasise the importance of process as much as product. This meta-cognitive learning is central to most students' experience of Education Studies and may be seen as part of the constructive alignment of learning and teaching as identified by Biggs (2003).

What has not changed, however, and what those of us involved in Education Studies believe is important is what we might consider as good pedagogical practice. Learning and teaching are still about developing deep approaches and motivating students to learn (Biggs 2003, Entwistle 1998, Ramsden 2003). The approach students take to their learning depends upon their perception of the learning and teaching process and as Prosser and Trigwell (1999) suggest, it is not only students' perception of the learning and teaching context that determines the approach being adopted but also students' perceptions of their place within that context.

One of these perceptions concerns the process of interaction with other individuals, including their peers. Students given the chance to interact with each other are more likely to adopt deeper approaches to learning. The question is whether new ways of organising learning and teaching are providing students with such an opportunity. There are considerable pressures being placed upon institutions of HE to develop and market their programmes regionally, nationally and globally. In response they have developed a range of methods to help deliver their courses.   If, as Massicotte (1997) suggests, distance learning is about individual learning then it is incumbent upon us to make sure that if we develop such courses we don't loose sight of the need to involve individuals in meaningful peer interaction that may help them to develop deep approaches. Whilst technology may help us to do so through more interactive on-line support systems, there is probably still some way to go before most of us feel confident in its ability to deliver.

> …the challenge will be to adapt the technology to the essence of education, the human communication within a community of people sharing understanding and meaning. (Massicotte 1997, p.5)

Perhaps 'flexible' or 'blended' learning is beginning to answer this challenge by providing us with the opportunity to help students engage in meaningful interaction and at the same time draw upon the resources technology has to offer. The challenge that faces us is our ability to make a new constructive alignment that engages students in meaningful learning and helps them to achieve deeper levels of learning.

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