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A matter of trust and identity: some university teachers' responses to the increased use of information technology in their working environment

Submitted by

Hilary Spencer

to

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Declaration

I, Hilary Spencer, confirm that the work presented in this thesis is my own. Where information has been derived from other sources, I confirm that this has been indicated in the thesis.

Signed

Abstract

This is a qualitative study into university teachers' responses to e-learning technology (eLT), situated within the debate about how greater use of eLT might affect universities' role in Society.

The context is the increased use of eLT in Higher Education and its promotion by various stakeholders. Its effect on students has been well researched but less may be found relating to teachers. The movement may therefore be insufficiently informed about eLT's effect on university teachers, leading to potentially negative consequences.

My methodology, inspired by Kvale's traveller/researcher metaphor, is based on interviews and thematic analyses of their transcripts. Participants' reactions to the technologies they use are explored in semi-structured, in-depth interviews where the interviewees describe their feelings on a range of issues related to their use of eLT.

Through these conversations I find that, whilst most of the interviewees see themselves as technophiles, they are nonetheless experiencing issues which could adversely affect their teaching. I group these into three themes: *control*, *privacy* and *knowledge ownership* and explore how they may be interrelated through underlying 'meta-themes' related to teachers' feelings of *identity* and *trust*.

I also discover that many of these feelings are not overt, even to the teachers concerned, but only become apparent in certain circumstances. The implications are that critical decisions about technology and teachers' well-being, if taken only on the strength of surveys or structured interviews, may be ill founded and lead to unwelcome consequences.

I conclude that teachers' responses to eLT need to be understood from a plural perspective, including considerations of trust and identity, if eLT-based practices are to be successfully introduced into Higher Education. If teachers lose their trust (in their students, management or peers) and question their professional identity, their ability to give of their best to their teaching may suffer, with potentially detrimental effects on the sector.

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Preamble - Thesis structure

This thesis is concerned with Higher Education teachers' issues over knowledge ownership, control and privacy in e-learning technology (eLT) based teaching. The first three chapters concern the aims and context of my investigation, the next two explain my methods, the central chapters describe my results and the final two focus on what I make of these. Details of my references and a glossary of terms follow, along with two appendices.

Chapter 1 covers the research question, how I arrived at it, and the broad debate within which this question is situated. In particular, because the research question is related to the effect e-learning technology might be having on the role of universities in Society, a number of contrasting views on the proper role of a university are discussed here.

Chapter 2 explains the research context, in terms of the researcher (myself), the universities where the interviews took place, and the wider setting (changes in Higher Education and Society), to help readers judge where its results might be applicable.

Chapter 3 discusses what I read relating to: the background and context of this investigation (the overall debate, the role of universities, and technology-supported learning; the themes and sub-themes which emerged from my interviews (control and power; plagiarism and intellectual property rights; privacy and surveillance); and the linking themes (identity and trust) which I propose for the overall conceptual framework.

Chapter 4 covers the investigation's methodology, methods and techniques, including validation and ethical considerations, along with reflections on strengths and weaknesses and how these were used or mitigated.

Chapter 5 relates what I actually did, in time sequence (the other chapters are arranged by subject matter), to avoid any confusion inherent in the structure of the rest of the thesis and to provide a clear mapping for the research.

Chapter 6 describes the first theme to emerge from my interviews (*Control*), including issues about control over change, the teaching process and the technology, and shifts in power and authority balances.

Chapter 7 covers the second theme I identify (*Knowledge Ownership*) and includes issues of plagiarism, intellectual property rights, the commerce in 'courseware', and changing attitudes to information, knowledge and wisdom.

Chapter 8 concerns my third theme (*Privacy*), including issues related to monitoring and being monitored, secret identities, surveillance by examiners and transparency of process.

Chapter 9 draws my findings together through a conceptual framework within which concerns about *identity* and *trust* interlink the themes identified through my interviews. These links are explained in terms of the erosion of teachers' sense of identity and ability to trust other Higher Education stakeholders through reduction in their rights to knowledge ownership, privacy and sense of control. The resultant effect on teachers of all these factors and the challenge of introducing changes (such as e-learning technology) where there is a climate of mistrust and role confusion are also explored.

Chapter 10 reflects on the investigation as a whole, including its original purpose and how well it has answered the research question. It also considers what has changed in eLT and Higher Education since the investigation began and addresses some outstanding questions, including how much of this is new, how much is related to the technology and what the consequences of this research might be for Higher Education and society. It concludes with a summary of the study's findings and their implications on Higher Education and its stakeholders.

1 Introduction

1.1 Research question

How are university teachers responding to the increased requirement to use elearning technology (eLT¹) in their teaching methods, and how might these responses affect the Higher Education sector in this country? In particular, does the advent of eLT constitute a potential threat to the fundamental role and nature of universities or might it, conversely, help them to reassert their position as core elements of Society?

The above is my research question, arrived at by a somewhat tortuous process (as described below) and answered by an even more extended process – my entire research investigation. The question, and the answering of it, is the subject of this thesis.

In this first section, to put the rest of this thesis clearly in context, I set out exactly what is being asked by this question and why I hold it to be of immense importance to all those concerned with Higher Education (HE) in the UK at this time. I describe how I arrived at my research question, in terms of my original interest in how technology might affect HE quality, and how I progressed from these early ideas, through an exploration of "HE-stakeholder satisfaction", to the final research question set out above. For clarity, I also include an explanation of what I mean by "e-learning technology", "virtual learning environment" and similar terms which are used extensively within this thesis.

In the second section, I look at the broader debate within which this research is situated, by considering the accepted role of universities in past and present times and how the introduction of technology may be expected to affect this.

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¹ An explanation of what "eLT" encompasses is given at the end of this section

1.1.1 The issue

The first issue which must be addressed is what *exactly* is being asked by this research question. The question employs the word "response", which is sometimes used in every-day English to describe feelings ("his response was one of fear") and at other times to describe the actions caused by such feelings ("his response was to run away"). This investigation focuses primarily on the former: the *feelings* generated in teachers by the phenomena concerned. While the consequent actions (that is, the teachers' *reactions*) are occasionally mentioned in the body of the thesis, this subject is generally reserved for the last chapter where I discuss the potential implications of my research findings.

The most important point, then, is that this investigation is primarily about feelings – feelings prompted by the wide-scale introduction into our universities of modern communications and information technology tools such as internet search engines (*Google* and the like), electronic mail (e-mail) and virtual learning environments (VLEs).

This research is about feelings so I ask how teachers are "responding" to the introduction of e-learning technology (eLT) and how these responses "might" affect the HE sector: an investigation of feelings cannot deal in certainties and provable facts, only in observed reactions and reported impressions. That these feeling may be ill-defined and their existence impossible to prove does not seem to me to be a barrier to consideration of their possible consequences (which is, ultimately, my prime objective). William Thomas claimed that "if men define situations as real, they are real in their consequences" (Thomas & Thomas 1928) which I interpret as meaning, among other things, that the consequences of the feelings expressed by my interviewees can be real, whether or not I (or even they) can prove that these feelings really exist. This, then, leads to the second point of clarification about my research question: while it concerns teachers' feelings, in the first instance, its ultimate goal is to get a better understanding of the consequences which might arise from these feelings.

This takes me to my third point, regarding the significance of my research question, because its importance stems from the very consequences mentioned above. Although the matter of whether technology makes teachers feel empowered or disempowered, more satisfied with their role or less, and so on is clearly of great interest to the teachers concerned, it is the potential effect of these reactions on the future of Higher Education in this country as a whole which is of importance to us all. As discussed in the next section, Higher Education has a range of stakeholders, each of which may affect its wellbeing, and the responses of any of these stakeholders (for example, its teachers) to a major change (such as the introduction of eLT) will affect the rest. Furthermore, as again discussed the next section, the role of universities and the manner in which their students are taught has a fundamental effect on our whole society. It follows that, if eLT itself, or at least people's responses to it, might affect that role or those teaching practices, our society will be affected and it would be prudent for us to consider whether the potential consequences are welcome or not before it is too late to do anything about it.

Note: This thesis frequently uses terms such as "e-learning technology", "educational technology" or even just "technology" to describe the tools with which this research is concerned. Such terms, however, could encompass a very broad range of tools, such as computers, electronic white-boards, calculators and even the Brunsviga calculating machines which I used in my first degree course in the 1960s. I need to make it clear at the outset that the technologies which are the subject of this thesis are internet search engines, electronic mail and virtual learning environments (see Annex B), because that is what my interviewees took to be my focus when I said "Tell me how you feel about educational technology". There are occasional mentions of other tools by interviewees but these are not generally included under the terms "technology", "eLT" and the like unless the narrative specifically says so.

Furthermore, when I (or my interviewees) refer to "teachers' responses to the technology" or "the technology causes such and such a reaction", it is to be understood that it is not, of course the technology *per se* which is being referred to but rather the use of the technology which is the subject concerned.

1.1.2 The initial idea

Although my eventual research question was framed as set out at the beginning of this chapter, this was not where my interest started. I relate here my early thought and concerns, because they are simplified version of the topic which I eventually settled on, and were a significant help to me in the search for a well-balanced research question. In addition, many of the ideas I outline here (such as the potential imbalance if one group of "stakeholders" becomes disenchanted with HE) apply equally to the more complex question.

Those of these ideas which apply to my research question, as it was ultimately defined, are revisited at the end of this thesis in Chapter 10, *Reflections*.

1.1.3 Stakeholder satisfaction

The last fifty years have seen rapid developments in communications and information technology and its use to support teaching and learning in Higher Education. Much has been written on the subject of how *students* feel about this trend and how their learning experience may be enhanced through the use of eLT but students are not the only group of people who may be affected and it seemed to me from the very start of my research interest that other groups deserved similar consideration, too.

In parallel to this growth in the use of eLT, there has also been a growing trend to enquire into the "satisfaction" of particular groups of people ("stakeholders"), which has spread to the HE sector in recent years. The general assumption is that the "satisfaction" of groups such as staff and customers ("faculty" and "students" in HE parlance) with their jobs and the service they receive (in HE, their teaching or learning experiences) can somehow be determined and quantified, and actions devised to improve this. Thus, my original ideas developed at a time of rapid development of eLT plus a fashion to investigate — with a view to improving — something called "stakeholder satisfaction". I therefore started looking at who HE stakeholders are, how they might be satisfied, why this should matter and which ones might merit further investigation. The following paragraphs summarise my early thoughts on these topics.

HE stakeholders and how to define their satisfaction.

The concept of HE "stakeholders" has been in common use for some years but there does not seem to be consensus of opinion on who they are. In my early research, I used an amalgam of several lists (such as those given in Pupius, 2001 and Winkworth, 2000) to define an HEI's stakeholders as follows: students; teaching staff; service providers and support staff (e.g. IT services); HEI managers; funding bodies; employers (eg industry, commerce and the professions); parents and other supporters of students and potential students; and Society as a whole.

Note: traditionally, the term has required a *stakeholder* in something to have a financial interest (a *stake*) in that thing. In the increasingly commercial world of today's HE, this does not seem at odds with the above groups being seen as "stakeholders" of the HE process.

Similarly, "stakeholder satisfaction" has become a well-used expression and student and staff satisfaction surveys have become common in UK universities (for example, see Knight and Harvey 1998). Satisfaction is a hard notion to define, however, and the term's users seem to take one of two routes:

- Some (e.g. Fredericksen et al, 2000) work in terms of "objectives to be met" and take a quantitative approach. For example, if a group of students' only objectives are to (1) gain a qualification and (2) enjoy their time at university, and both these outcomes occur, it may be said, under this approach, that these students have been fully satisfied with their HE experience.
- Others (for example, Turgeon et al 2000) treat satisfaction as a broad term to describe a state of mind or a set of feelings and adopt a qualitative approach to its analysis. Thus, teachers who say how "satisfied" they are with eLT would have a range of feelings, along a broad spectrum from disenchantment to pleasure, which combine to give them an overall attitude towards it somewhere between very keen and unenthusiastic.

At the start of my research, when I wanted to explore HE stakeholder satisfaction and had to decide which of these two approaches to use, I chose

the latter approach as it appeared to be the more useful to understanding teachers' feelings.

• Why the satisfaction of <u>all</u> stakeholders should be considered

Purists might say that the only satisfaction which matters is that of the learners – it could be assumed that students who deem their HE experience to have been "satisfactory" have learned what they wanted to know, as that would logically be the prime measure of their satisfaction. Further, an altruistic teacher might feel that the only point of their job was to satisfy students' desire for learning, so if the students are satisfied, the teacher must be satisfied, too. However, these positions are somewhat idealistic and may not be held by all.

In addition, it seems that an imbalance will occur unless *all* stakeholders have their requirements of HE more or less satisfied by the its process and its results.

- Students' requirements, at their simplest, may be to learn all they want to know in a way which is best for them, in terms of effort, money, time and discomfort (such as boredom). If these are not satisfied, those who are keen to learn will eventually find other places or ways to do so and the rest will simply fail to learn, leading to dissatisfaction among all other stakeholders whose prime purpose is to enable quality learning to take place.
- Teaching staff's expectations might loosely be phrased as enabling, in a
 manner which is cost-effective/rewarding in terms of their effort, time,
 career success and (dis)comfort, each of their students to meet his or her
 needs. If teachers are dissatisfied, they will eventually choose other jobs
 until a lack of teachers leads to deterioration in the quality of education and
 hence to student and other stakeholder dissatisfaction, as before.
- Other stakeholder groups, such as service providers, managers, funding bodies, parents and employers, can be similarly considered in terms of their expectations and the degree to which these expectations are met. In each case, if they are dissatisfied, they may in time withdraw their stake (their money, support or offspring), thereby impacting the work and lives of other HE stakeholders who depend on their support.

It would therefore follow that if *any* stakeholder group is dissatisfied with HE provision, the others will eventually become dissatisfied too, and hence the views of all should be considered when any major change, such as the whole-scale introduction of e-learning technology, is under way.

Which stakeholders to focus on?

In 2002, when I was reading around my initial idea for a research question, I found that a quantity of research (e.g. Almeda & Rose 2000, Arvan & Musemeci 2000) into "faculty satisfaction with educational technology" had emerged from the US but there seemed to be little equivalent data from the UK. This concerned me as teachers' feelings about the technology could significantly affect both the recruitment and retention of academics to our universities and eLT's take-up, in terms of how it is used and how swiftly and effectively it is deployed (Jaffee 1998, Schifter 2000). Conversely, from my background in information technology, I knew that a better understanding among eLT designers of what HE teaching staff feel about their products should lead to design improvements in the tools concerned. In other words, I felt that this apparent lack of understanding of UK HE teachers' feelings about eLT could lead to any or all of a reduction of university teacher numbers, poor deployment of tools which could enhance HE teaching and learning, and poor design of the tools concerned, so this seemed to be a topic worthy of further investigation.

1.1.4 What sort of investigation?

Much money and effort has been expended by UK universities on the design, distribution and analysis of questionnaires aimed at determining the satisfaction of their students and employees. The results, however, are often (e.g. Fredericksen *et al*, 2000) presented in a form such as "x% of faculty said they were satisfied or very satisfied". This can be difficult to interpret meaningfully or use to determine how eLT might best contribute to HE teaching and learning.

The research papers which have focussed specifically on teacher satisfaction with eLT have often reported in a similar style. For example, the report

(Hartman *et al* 2000) from the University of Florida includes many statistical analyses of the results from a survey into faculty satisfaction with educational technology. Their results show, *inter alia*, an impressive 83.4% of respondents "satisfied" with their experience of on-line teaching, compared with only 13.4% "dissatisfied" (the rest coming somewhere in between). However, it was left to the respondent to decide what was meant by "satisfied", which made the results hard to interpret. The study compensated by approaching the matter of how satisfactory the university's on-line teaching was in many different ways, such as consideration of whether or not faculty workload had increased (90% said it had), and whether student drop-out/failure rates had changed (they had increased, at least for fully on-line courses). This might have been a useful way to look at general effects of using eLT, but was less useful for considering the specific question of teacher satisfaction with the use of this technology.

I therefore formed two impressions of research methods from these studies: there seemed to have been rather more quantitative studies than qualitative ones; and these qualitative investigations, although hugely thorough and precise in the enunciation of their conclusions, were very difficult to interpret in an everyday context. While the seeming shortage of qualitative studies would not have been, by itself, a sufficient reason for adopting such an approach myself, when I considered the two factors together, I began to think that a qualitative approach would be the more useful one to adopt.

1.1.5 Framing the question

As described in Chapter 4, the methodology I adopted for this work was analogous to a journey of discovery, whose final destination was not at all clear at the start. At the start, my aim was just to explore the relationships between information technology and pedagogy and my proposition was as follows²:

"Technology is making great inroads into the delivery of HE. A number of companies developing and marketing computer managed instruction systems seem to have shifted their aim from *supporting* HE tutors to replacing them, based on a premise that the right technology is both necessary and sufficient to improve the quality of HE. They are starting to

Chapter1: Introduction

² Extract from my proposal to UCL for admission to conduct research: September 2001

claim that quality will be enhanced by focussing more on technology and less on pedagogy and many HE stakeholders – from HEFCE and university boards to tutors and students – are being swept along with this. My objective is therefore to question this assumption before too much investment has been made in the technology, and too many pedagogical skills have been lost, for this trend to be modified."

In other words, I was simply asking at the beginning whether the quality of HE is necessarily enhanced (rather than being unaffected or even reduced) by the use of technology in universities. I acknowledged, even in this initial question, that there was a number of different sets of people with interest in HE quality and soon recast my question in terms of "stakeholder satisfaction" with HE.

Over the period since that proposition was first formulated, my interest progressed from "HE-stakeholder satisfaction with all kinds of information technology in various countries", to my ultimate focus on "university teachers' responses to particular e-learning technologies in the UK".

There are clearly many differences between this first proposition and my final research question. For example, my focus moved from "technology in general" to "search engines, e-mails and VLEs" in particular, from "all HE stakeholders" to one specific group (university teachers), from "asking whether quality is enhanced" to "looking at responses". Further, it became clear that I could not hope to draw conclusions about the effect of technology on the whole HE sector (my first ideas were very unrealistic, in retrospect) but only to contribute to, and perhaps stimulate, the related debate. That is, the conclusions from my research, derived principally from semi-structured conversations with a particular set of teachers, can only point to *potential* responses by other teachers, and *potential* effects on the HE sector which, I suggest in Chapter 10, should be considered when teaching aids such as VLEs are being selected and introduced into universities.

Nonetheless, the final research question was still couched within the spirit of the original concern – that the current immense enthusiasm for the introduction of eLT into all aspects of university teaching was not supported by sufficient critical research into the effects this might have, and indeed is already having, on the HE sector and its stakeholders.

1.2 Background

The overall debate within which my research is situated may be set out as follows:

Many people have forecast that eLT will profoundly affect the university sector but opinions vary on how far this effect is likely to benefit HE. At the extremes are those who fear it will threaten the fundamental role of the universities and those associated them – maybe endangering the very existence of universities – and others who predict it could enable universities to recover their rightful places as core institutions of society.

My aim is to contribute to this debate by considering teachers' feelings about the impact of e-learning technology on their work and lives. However, I need to address the basic question: "What is the role of the university?" before I can consider whether eLT, and teachers' responses to it, might affect the ability of universities to carry out this role, or even change the role's nature altogether.

1.2.1 Role of a university – historical perspective

There seem to be several (sometimes overlapping) schools of thought on this question, including the following:

- It should develop the 'whole person' for a worthy purpose (for example, to promote happiness, inner perfection or help pupils find truth and virtue).
 Exponents of this view include Plato 1910, Leibniz 1991, Schiller 1789, Newman 1852 and, more recently, Kerr 1963 and Dearing 1997.
- 2. It should simply pass already extant knowledge from teacher to learner, because the pursuit of knowledge or truth is a natural human activity which should be encouraged. Universities based on this model were common before Humboldt advocated the combining of knowledge creation and transmission in the same institutions at the beginning of the 19th century.
- 3. It should teach useful skills, so as to enable people to work and Society to function efficiently. Montaigne 1588, Milton 1670, Dearing *ibid*, and recent UK governments have been subscribers to this tenet.

4. It should also promote democracy and respect for society's laws and conventions; Dewey 1916 and Dearing are among those who hold this view.

The' broad role' brigade

I found innumerable examples of writers, ancient and modern, who felt that the purpose of education was more than just the transmission of basic knowledge and development of practical skills. For example, according to Plato 1910 (Meno), Socrates held that only "virtue", which includes all "true vigorous and practical knowledge", can lead to perfect happiness; that is, he held that seats of learning exist in order to help people to achieve happiness through acquiring knowledge. Plato himself claimed (ibid) that "the highest aim of the intellectual man is to know" and the aim of all education is to implant in humanity a desire to attain wisdom for its intrinsic value. He held strong views on teacher's responsibilities: in Charles Hummel's paraphrasing (Hummel, 1994: p333) the teacher "must never be a mere peddler of materials for study and of recipes for winning disputes, nor yet for promoting a career". Likewise, Cicero, when he was listing types of mental excellence, cited the pursuit of knowledge for its own sake as the first of them. John Newman quotes him as follows: "This pertains most of all to human nature" he says "for we are all of us drawn to the pursuit of knowledge; in which to excel we consider excellent, whereas to mistake, to err, to be ignorant, to be deceived, is both an evil and a disgrace" " (Newman 1852, Discourse 5:3). Cicero considered knowledge to be the very first object, after the supply of our physical wants, to which we are attracted and said (ibid) that after the calls and duties of "our animal existence". there follows "the search after truth", and that therefore "as soon as we escape from the pressure of necessary cares, forthwith we desire to see, to hear, and to learn; and consider the knowledge of what is hidden or is wonderful a condition of our happiness."

Similarly, in more recent times, Gottfried Leibniz believed in striving for the truth as the real meaning of life (for example, see Leibniz 1991) and Friedrich Schiller denounced those whose only reason for being at university was "to fill their bellies". The latter wrote (Schiller 1789) "Who rants more against reformers than the gaggle of bread-fed scholars? Who more holds up the

progress of useful revolutions in the kingdom of knowledge than these very men?" and declared that the bread-fed scholar ('instrumental learner' in modern parlance) "seeks his rewards not in the treasures of his mind – [but] from the recognition of others, from positions of honour, from personal security". The opposite, for Schiller, was the "philosophical mind" whose "efforts are directed toward the perfection of his knowledge; his noble impatience cannot rest until all of his conceptions have ordered themselves into an organic whole, until he stands at the centre of his art, his science" (*ibid*). Similarly, Humboldt endorsed Leibniz's and Schiller's views, declaring that universities should promote "the self-realization of man through the unity of all human capacities" (see Holborn 1953) and that the university is "reserved for what the human being can find by and within himself":

Knowledge transfer and training the intellect

By contrast with the above, Newman believed that a university was primarily a place for acquiring existing knowledge, rather than developing the spirit or discovering / creating new knowledge. He said:

"The view taken of a University in these Discourses is the following: that it is a place of teaching universal knowledge. This implies that its object is, on the one hand, intellectual, not moral; and, on the other, that it is the diffusion and extension of knowledge rather than the advancement. If its object were scientific and philosophical discovery, I do not see why a University should have students." (Newman 1852)³:

He viewed a university's second purpose as being to train the intellect and enable students to learn useful skills, so they could live comfortably in society and, where possible, become successful in their professions. He went on to say (*ibid*):

"When the intellect has once been properly trained and formed to have a connected view or grasp of things, it ... makes itself felt in the good sense, sobriety of thought, reasonableness, candour, self-command, and steadiness of view which characterize it. In some it will have developed habits of business, power of influencing others, and sagacity. In others it will elicit the talent of philosophical speculation, and lead the mind forward to eminence in this or that intellectual department. In all it will be a faculty of entering with comparative ease into any subject of thought, and of taking up with aptitude any science or profession."

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³ I include these quite substantial quotations from Newman because they have an amazingly modern ring to them: had he used the expression "transferable skills", he would have been fully in tune with recent UK government policies

He does however accept that "the attainment of truth ... is the common end" [of all studies] and that knowledge is an end in itself, as shown by the following passage (*ibid*).

"That further advantages accrue to us and rebound to others by its possession, over and above what it is in itself, I am very far indeed from denying; but, independent of these, we are satisfying a direct need of our nature in its very acquisition; and, whereas our nature, unlike that of the inferior creation, does not at once reach its perfection, but depends, in order to it, on a number of external aids and appliances, Knowledge, as one of the principal of these, is valuable for what its very presence in us does for us after the manner of a habit, even though it be turned to no further account, nor sub-serve any direct end."

Skills acquisition

An example of one who believed in the third role is John Milton, who thought that a primary aim of education was to teach people skills they would need in their life and work. He wrote "I call therefore a complete and generous education that which fits a man to perform justly, skilfully and magnanimously all the offices, both private and public, of peace and war." (Milton 1670:160).

The modern view

In our own times, much has been theorised about universities' roles (Kerr 1963 and Barnett 1990, 1997 & 2004, for example) but in 1996, a team led by Ron Barnett was tasked by the government with finding out what people in the UK actually wanted from their universities. It held a large consultation exercise on the subject with a broad range of HE stakeholders which was published as an appendix to the Dearing Report and began its summary of the views Barnett had received as follows:

- "2.1 Robbins (1963) identified four purposes of higher education.
- i. Instruction in skills 'suitable to play a part in the general division of labour'
- ii. The promotion of the general powers of the mind
- iii. The advancement of learning
- iv. The transmission of a common culture and common standards of citizenship
- 2.2 These aims are generally endorsed. All are felt to be necessary purposes of higher education. However, there is a widely held sense that they need to be reinterpreted and extended if they are to remain valid in the modern context." (Barnett in Dearing 1997: Report 1 Ch. 2)

It then describe a broad range of 'reinterpretations and extensions' suggested by the responders, including a closer relationship between HE and work, promotion of 'powers of action', an emphasis on lifelong learning, the promotion of social justice and self reliance and having a beneficial effect on the quality of life of all involved in HE and across society.

Dearing himself declared in his report (*ibid*) that "Education is life enriching and desirable in its own right. It is fundamental to the achievement of an improved quality of life in the UK" (Introduction to Summary Report 2). He goes on:

"Higher education is fundamental to the social, economic and cultural health of the nation. It will contribute not only through the intellectual development of students and by equipping them for work, but also by adding to the world's store of knowledge and understanding, fostering culture for its own sake, and promoting the values that characterise higher education: respect for evidence; respect for individuals and their views; and the search for truth. Equally, part of its task will be to accept a duty of care for the wellbeing of our democratic civilisation, based on respect for the individual and respect by the individual for the conventions and laws which provide the basis of a civilised society." (*ibid*, 8)

He also quotes Masefield in describing a university as "a place where those who hate ignorance may strive to know, where those who perceive truth may strive to make others see; where seekers and learners alike, banded together in the search for knowledge, will honour thought in all its finer ways, will welcome thinkers in distress or in exile, will uphold ever the dignity of thought and learning and will exact standards in these things." (Chair's Foreword, 7)

These aspirations preface a report which wholeheartedly encourages the introduction and expanded use of educational technology in universities by recommending, for example, that the Government should "facilitate discussion between all relevant interest groups on promoting the development of computer-based materials [for HE teaching]" (Recommendation 15) and "harness and maximise the benefits of Communications and Information Technology [in HE]" (Recommendation 44). Clearly, Dearing saw no potential conflict between the advancement of the use of educational technology in universities and the maintenance, or reinstatement, of a sense of well-being in their teachers – or at least, if he did, he did not mention them in this report.

Dearing's view may of course have been affected by the views of his sponsors. The UK government which commissioned his report required him to work within a number of principles including: "[HE] learning should be increasingly responsive to employment needs and include the development of general skills, widely valued in employment" and "value for money and costeffectiveness should be obtained in the use of resources" (Terms of Reference and Membership). In other words, he was required to base his recommendations within a context where university teaching was aimed, at least partly, at fitting students for subsequent employment (echoing Newman and Milton's beliefs) and economy and cost cutting were of prime importance. While Dearing clearly has issues with this latter constraint ("We are particularly concerned about planned further reductions in the unit of funding for higher education", he says in paragraph 7 of his *Forward*), he is obliged to work within it and he mentions more than once the contribution educational technology can make towards achieving these economies. Whether he saw no potential adverse effects on HE teachers from the enthusiastic take-up of the technology which his supports in his report, or whether he considered this an inappropriate place to mention it, is not clear; suffice to say that his report, which was very influential on the changes experienced in the HE sector (including the spread of e-learning) in the following decade, did not take the potential effect of the technology on university teachers into account.

Conclusion

In summary, the accepted view of the proper role of a university, or more generally of education, seems to have changed over the centuries from the position of Plato *et al* – that education should develop the whole person and that the students should be fully involved in creating/discovering knowledge (for example through discourse) – via those in the intervening years who believed it should have a more focussed role (for example, knowledge transfer, training the intellect, or acquiring useful skills) to arrive at the current view that a university's role is a combination of *all* these functions and more, including intellect development, knowledge creation and transfer, acquisition of useful skills, fostering democracy and teaching people to live together in the modern society. Added to that are the extra, essentially modern concerns related to

making education available to all, regardless of gender, religion, status, wealth, age or distance from a suitable HEI, plus the financial challenges of funding such educational facilities in an age which is seen as having ever-increasing public spending requirements and a far from infinite source of public funds⁴.

1.2.2 E-learning's relevance to the university's role

The above discussion of the university's proper role in Society is relevant to this thesis because my research question includes concerns about how eLT, and teachers' responses to it, might affect that role and universities' ability to fulfil it. The first question then, is how might eLT help universities achieve these eminently justifiable but highly ambitious aims? My perception is of a wide-spread view that eLT will support universities' achievement of their aims by improving the student experience (and possibly reducing costs) but little thought has been given to how it may impact teachers.

For example, Dearing appeared to take it as self evident that information technology (C&IT) in general and eLT in particular will benefit universities when he baldly states (*ibid*: Summary Report, 65) "Throughout our report we identify scope for the innovative use of new Communications and Information Technologies (C&IT) to improve the quality and flexibility of higher education and its management. We believe these give scope for a reduction in costs". That is, he takes it as axiomatic that C&IT will be good for HE and hopes that it will enable some of the cost reductions expected of the sector. Concerning staff responses to these technologies, he does suggest (Recommendations 9 and 47) that all institutions should "review the changing role of staff as a result of C&IT" and ensure that staff "receive appropriate training and support to enable them to realise its full potential" but does not otherwise consider any effect C&IT might have on staff.

Regarding eLT in particular, Dearing simply says (Summary Report, 68) "The use of new technologies for learning and teaching is still at a developmental stage". He does advocate the "development *and sharing between HEIs*⁵ of computer-based learning materials" and a review and amendment of copyright

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⁴ I say "perceived" because I doubt whether there was ever enough funding available to meet the public's view of what should be provided to it from the public purse.

legislation to "facilitate greater ease of use of copyright materials in digital form by teachers" (Recommendations 16 and 43), two topics which figure later in this thesis, but otherwise makes no other observations on eLT's potential effects on HEIs⁶. Diana Laurillard, however, is very clear on how eLT should be able to help universities achieve their aims. She says (Laurillard 2006:2):

"It is important because e-learning can make a significant difference: to how learners learn, how quickly they master a skill, how easy it is to study; and, equally important, how much they enjoy learning.

There is also a financial impact. Networks and access to online materials offer an alternative to place-based education which reduces the requirement for expensive buildings, and the costs of delivery of distance learning materials. However, learners still need people support, so the expected financial gains are usually overwhelmed by the investment costs of a new system and the cost of learning how to do it."

In summary, Laurillard is certain that eLT will contribute hugely to HE's ability enable learning (its principal role) and suggests that it may in time help HE make economies (an objective of at least some of its stakeholders). However, like Dearing, she makes no mention here of its potential impact on HE teachers except to hint ("reduces ... the costs of delivery") that fewer teachers might be needed when eLT is used. (The "people support" she mentions turns out to be the technologists and trainers required by eLT's introduction, not teachers.) She does, however, touch on this later in the same chapter (*ibid*:5):

"We could position e-learning, therefore, as the means by which universities and academics manage the difficult trick of making the learner's interaction with the academic feel like a personalised learning experience, focused on their needs and aspirations, developing their skills and knowledge to the high level universities always aspired to, while doing this on the large scale"

but again, this remark is clearly focussed on improving the learner's experience; the teacher's needs are not under consideration at this point.

Writers who have predicted other ways in which eLT might help HEIs to play their required role in Society have similarly focussed on the learner. For example, Julie Davies and Nigel Pigott quote Margaret Hodge, Minister for Lifelong Learning and Education at that time, as follows: "Distance learning

⁵ My emphasis

⁶ Probably because eLT was new and there was little research into its potential impact (see Section 1.2).

can make a real difference for students whose personal circumstances mean they need greater flexibility in when and how they study" (Davies & Pigott 2002), which was one of the 'modern' HEI roles referred to above, and Peter Goodyear argues that "the incursion of ICT enriches ... the [student's] physical environment" in many ways which, he explains, improves the learning experience and hence contributes to HEI's ability to achieve their objectives (Goodyear 1999). These, and many others (Langlois 2003, Conole & Oliver 1998, Weller 2002, Goodfellow and Lea 2007, Katz *et al* 2001 and others) all suggest ways in which eLT could and does make a crucial contribution to HE's ability to meet various elements of its mission, as it is currently understood.

Conclusions

Like Dearing, I am certain that eLT is making, and will continue to make, a huge contribution to universities' ability to achieve the aims discussed in Section 1.2.1. This is particularly clear with regard to accessibility – distance learning enables many who live far from an HEI, who have to study part-time while they work, or who are in other ways prevented from joining in traditional place-and-time-based learning, to access higher education. However, eLT also supports many other of the perceived objectives of a university; for example: knowledge creation (modern researchers rely on the power of search engines and even undergraduates are starting to join in research projects, as described in Chang, 2005); knowledge transfer (so much more information can be provided via "Blackboard" than a blackboard, in a variety of ways to suit a range of learning styles, so that the potential for increased knowledge transfer is significantly enhanced); intellect development (eLT-based learning can be more taxing then the passive note taking of many students in my own degree course); and the acquisition of useful skills (not least, computer and webrelated skills).

However, unlike Dearing (and others), I am have concerns about the potential effect of eLT on university teachers, a subject which does not seem to me to have been sufficiently explored, and it is my hope that this thesis will help to redress this matter.

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⁷ The name of the VLE used by many of my interviewees

2 Context

This chapter describes the specific context within which this research was undertaken. An appreciation of this context is important for two reasons: firstly, it has strongly influenced the focus, methodology, and choice of location and interviewees for the field work; and secondly, the results obtained from the research must needs be interpreted within this context. Significant elements of the context were: my own experience; the two universities at which the majority of the field work was done; the disciplines from which interviewees were selected; the choice of interviewees themselves; the environment in which the discussions took place; the prevailing educational climate; the technological climate in UK HE at the time of the research; and the broader state of society at this, the start of the new century. I describe each of these elements of the context in turn in this chapter, and reflect on the implications they have had on the conduct of, and results from, this research.

2.1 Myself

My own background and experience are important elements of the research context for several reasons.

Firstly, a major element of the subject matter (eLT) is by definition 'technical'. In such a study, in my experience, the researcher's knowledge and understanding of information technology is bound to affect both the way in which the interviewees discuss the topic and the manner and extent of the researcher's understanding of the discussions. This is not to say that this research could *not* have been conducted by a 'technological virgin' – some people warm to those who know less about the technology than themselves and enjoy explaining it from first principles, and most books and papers on the subject of teachers' responses to technology are written in a way which allows the non-technical user to understand them. However, this was not the situation in my case. I have spent my entire career in information technology, designing it, implementing it, training people to use it, and advising people on how to handle the changes it brings. In recent years, much of my computer-related advice has been directed towards the Higher Education sector and has been

related, in particular, to choice of educational technology and the management of the changes its implementation brings. Hence, in these interviews, I had a very good understanding of the technology itself and its *potential* effects on the teachers who use it, which helped me (slightly) to choose what to ask my interviewees and (more significantly) to understand what they were trying to explain. Furthermore, in my chosen methodology (see Chapter 4) it is accepted that the researcher is not a neutral, invisible presence but instead engages in constructive dialogue with his or her interviewees, actively encouraging debate on the subject being investigated. In my view, my technical background was of considerable assistance in enabling me to stimulate discussion about the subject at issue. I doubt whether my technical background had much effect on my resultant findings but nonetheless, it does need to be explained when the context of this research is being described.

A second aspect of my experience which added to the context in which this research was done was the fact that, for almost ten years, I have worked very closely with the particular university at which the majority of the interviews were held, both as a management consultant and as one of its Governors. I therefore had a particular insight into its operations, and the changes and tensions which were present at the time of my investigation. This, again, is bound to have affected my understanding of what was said to me by my interviewees; in fact, I believe it significantly enhanced my ability to appreciate the feelings they were trying to describe and explain. On the other hand, it could also have affected what they said to me: for example, there could have been a desire to paint an overly enthusiastic (or, in at least one case, an overly critical) picture for a member of the university's governing body. I was very conscious of this risk and took as many precautions as I could to mitigate it (see Chapter 4). However, as before, I feel it is important to record this element of the research context.

Finally, in regards to how my personal situation may have had bearing on my conduct of this research and its results, I feel that my original discipline – mathematics – has some relevance to the context of this work. I started my research imbued with a strong preference for quantitative research, probably because of my love for, and background in, mathematics. Although I set this

aside, somewhat reluctantly, when selecting my methodology, on the grounds that a qualitative approach seemed so much more appropriate (see Chapter 4), I found I had to constantly guard against a tendency to be overly quantitative when analysing my data. For example, I found I kept wanting to categorise binaurally any effects or phenomena I noticed – to describe people as either "positive" or "negative" about technology, "concerned" or "not concerned" about threats to their privacy, and so on – whereas I began to see, on reflection, that such an approach was over-simplistic and failed to take into account the range and complexities of people's feelings. Again, I return to this concern in Chapter 4 when discussing the ways in which I sought to ensure the validity of my methods and findings, and simply record here that I am by nature a mathematician, in case my research was still affected by this element of my background, despite my best efforts to the contrary.

2.2 The universities

2.2.1 Type of university

The interviews were conducted at two universities ("South University" and "North University") and I had strong connections with both of them, having studied at one and worked closely with the other for some years⁸. My original plan had been to interview teachers at a larger number of universities, to broaden the research base and give me the chance to draw conclusions about the effects of the technology in different types of Higher Education Institution (HEI). However, it soon became apparent that what the interviewees said, and my understanding of this, was likely to be significantly different in a university which I knew well and where I was myself well known, compared with one in which I was an outsider. I therefore felt that I had only two choices: to avoid the two universities which were well known to me or to restrict my research to these universities. I chose the latter option, because I was confident that my knowledge of these universities would be a help, rather than a hindrance, to my ability to encourage teachers to express their feelings and to properly understand what they were saying.

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⁸ See Chapter 4 regarding ethical considerations on the anonymity of the universities.

South University is a long established, traditional HEI. Although there are certainly many teachers in it who have been early and innovative adopters of educational technology to support their teaching, the university as a whole has not in general been at the forefront of implementing technology such as Virtual Learning Environments (VLEs) across the board. In particular, at the time of my interviews, it had only recently selected its first corporate VLE and it was allowing individual schools to choose how, when and how quickly they would adopt it (if at all). Likewise, many schools were allowing similar freedom to their staff, with the result that there was at that time a great variance in the technical skill and experience between individual teachers. As a result, some of my interviewees at this university were knowledgeable enthusiasts of the technology in general and VLEs in particular whereas at least one was a self-proclaimed reluctant user of technology and little or no experience of using the university VLE.

By contrast, North University was a new (post-'92) university which had been a very early adopter of educational technology in general and of VLEs in particular. It had experimented with the implementation of a virtual campus in the early 1990s and many of its teachers had used the VLE which had been the basis of this experiment continuously since that time. The university had decided to move to a new VLE about three years before the time of my interviews and had a fairly robust programme for rolling it out, with the intention of having all staff using a VLE - and, significantly, a single VLE within five years of its initial introduction to the teaching staff. The result was that every teacher I interviewed had at least been on a VLE-usage course, most were already using one (some had more than ten years of VLE experience) and all were very conscious of the introduction of the technology. An interesting side-effect of this was that some of the 'early adopters' had become so proficient with, and fond of, the university's original (home-grown) VLE that they were now reluctant – and in some cases highly resistant – to change to the new one.9

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Between them, my interviewees had experience of a dozen VLEs and were using three different ones at the time of my research, but the VLEs actually used by each of them is not relevant to this research.

A further feature of North University which had relevance to my research was that it had adopted a deliberately 'self-conscious' approach to its roll-out of the VLE, having monitored its progress continuously from the start of the programme and carried out several internal studies of its effects and effectiveness. This affected my research in two ways, one beneficial and one slightly problematic. On the positive side, I was allowed access to the results of this work and my analysis has benefited from this. On the other hand, I was warned to beware of "study-fatigue" in the staff and advised to take care not to contribute to this – for example, by seeking to use only willing volunteers for my interviews rather than trying to select them by means of random sampling techniques.

As before, I have not attempted to analyse how – if at all – the nature of my two chosen universities might have affected my results; that would have been a very different piece of research. I simply record these details so that the results may be understood in the context in which they were observed.

2.2.2 The disciplines of the interviewees

The interviewees were from a variety of disciplines of which business and finance, social science, education, law, mathematics and physics predominated. This was a result of my selecting four schools (one from South University and three from North University) which had each implemented the technology in a different way, with the intention of getting as wide a mix of experience with, and reactions to, the technology, as I could. The four schools' methods of rolling out their staff's use of the VLE varied from one which had left it entirely to the preference of its teachers whether or not they used the corporate VLE to another which was requiring all its staff to have made at least some use of the VLE by the end of the academic year in which the interviews took place. I did not plan to compare and contrast the results from teachers of different disciplines; rather I felt that I would get a useful diversity of views by choosing interviewees from these particular schools.

One aspect of my choice of schools turned out to have a particular relevance to the conclusions which I eventually reached after analysing my findings. It transpired (that is, the schools were not chosen for this reason) that two of the schools from which my interviewees were selected had been through periods of conflict from which they had not yet fully recovered. In one of the schools concerned, the staff had been involved in a major re-organisation only a short time before my interviews: another organisational unit in the university had been significantly reduced in size and the remaining staff of this unit had been incorporated into the school I had chosen to interview. This had caused considerable tension in the school: for example, staff resented the restructuring, felt sympathy for their departed colleagues and were uncertain about their own security. In a second school, there had been a small but rather public amount of industrial unrest among the staff (over a matter only peripherally related to the introduction of educational technology) which had led to some damage in relations between staff and the university's senior management. I am fairly confident that neither of these matters influenced my results in any way, but again I record these facts here anyway, for completeness.

2.2.3 Choice of interviewees

As is explained in Chapter 5, my interviewees were self selecting. I asked for volunteers and accepted all who were prepared to talk to me. The resultant set of interviewees (see Annex A) was a mixture of male and female, old and young, senior and junior, experienced and inexperienced, enthusiasts and reluctant users, long term employees and new arrivals. However, I made no attempt to ensure a similar balance of gender, age, teaching experience and so on as exists in the university teaching population as a whole, or even as could be found in the particular university employing my interviewees. Likewise, I did not attempt to compare responses according to such categories — I considered the samples to be much too small for such analysis. As before, I believe that this diversity contributed to the richness of the data I obtained from my interviews and was therefore very beneficial to my research, but it also has disadvantages. I reflect further on the methodological implications of this method of interviewee selection in Section 4.3.2.

2.2.4 Venue and environment

An interesting aspect of context which (to my surprise) appeared as if it might have significance was the environment in which the interviews were conducted. The pilot study interviews took place in two groups: the first three were conducted in a rather grim basement room, lacking natural light or redeeming features, and each was held just after lunch. I was dressed in typical student fashion (jeans, T-shirt and sandals) and wrote notes on a very scruffy note-pad. The next six were held in a sunny, 4th floor room, in mid-morning slots; I was in business woman clothes (suit, stockings and high heels) and armed with a brief case and hard-backed notebook. Subsequent reflection led me to wonder whether the interview time and environment could affect the results in any way so I ensured that all future interviews were held under the same conditions as the second six pilot interviews had been.¹⁰

2.3 The wider context

The above describes two facets of my research context: the researcher and the university environment in which the interviews were held. The third aspect which needs to be clarified, in order that the applicability of this research may best be understood, is the wider environment prevailing at that time. I address this here in terms of those changes in Higher Education, in information technology, and in Society in general, which were occurring at the time and which I believe had relevance to this research.

2.3.1 A new vision for HE

In the Introduction to the Dearing Report (Dearing *et al*, 1997), the authors set out their vision of Higher Education in the ensuing twenty years. They forecast "a new compact involving institutions and their staff, students, government, employers and society in general" – i.e. the stakeholders, see Chapter 1 – with "historic boundaries … breaking down" and where "each party should recognise its obligation to the others" (para 3). This, and the many other changes predicted in the report, including "a resumed expansion of student numbers" (para 4), "substantial [academic staff] redundancies" and "pressures

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¹⁰ For more details of these interviews , see Section 4.2

to reduce costs" (para 13), a massive reduction in the unit of funding per student (para 14), ever increasing competition between institutions (para 15 and 20), and the way that "technology ... opens up the possibility of higher education programmes being offered remotely by anyone anywhere in the world" (para 20), could be seen as constituting a revolution in the normally slow-moving world of academia, where many universities had prided themselves on remaining essentially unchanged for centuries.

More recently, many other commentators have maintained that the educational climate is now one of very significant change. For example, Adrian Wooldridge, when introducing the findings of a survey published by The Economist of Higher Education in Europe and America, claimed that the higher education system in the UK (and elsewhere) is currently undergoing a number of fundamental changes that may even challenge the very idea of the university itself (Wooldridge, 2005). The changes he listed included experiments with new ways of funding, the growth of 'new managerialism' in the HE sector, and the expansion of the 'delivery' of 'educational products' (both terms representing a new way of looking at education) via a variety of informationtechnology related tools. Wooldridge puts forward four main reasons for this: the opening up of higher education to a much larger proportion of the population (the so-called "massification" of education); the rise of the knowledge economy for which it is hoped higher education will provide the workers; globalisation, with various repercussions on the take up and provision of higher education; and increased competition by the HEIs for both resources and students.

Rosemary Deem also maintains that higher education in the UK has fundamentally changed in recent years. She focuses particularly on changes in HE management methods (see Deem 1998, for example), academic 'capitalism and entrepreneurism' and the effects of globalisation and internationalisation on higher education (see Deem 2001) and gives many examples of changed university attitudes and practices in these areas. In the preview to her recent book, she and her co-authors maintain that:

"The nature of Higher Education in the UK has changed over the last three decades. Academics can no longer be said to carry out their work in 'ivory towers', as increasing government intervention and a growing 'target

culture' has changed the way they work. Increasingly universities have transformed from 'communities of scholars' to 'workplaces'. The organization and administration of universities has seen a corresponding prevalence of ideas and strategies drawn from the 'New Public Management' ideology in response, promoting a more 'business-focussed' approach in the management of public services." (Deem *et al* 2007)

Thus, these (and other) writers are clearly in agreement that the HE sector is currently undergoing great changes but they do not advance any evidence that these changes will lead to improvements in the overall satisfaction with HE of any of its stakeholders. In particular, the UK government appears to be embracing 'massification' without allowing HEIs the resources necessary to implement its policies, seemingly requiring universities to solve this problem for themselves. The universities, faced with this requirement to teach a much larger number of students (some of whom, recruited under a "widening participation" approach, are also proving more costly to teach than the traditional student intake (Brown & Piatt 2001; Taylor et al 2005)) without a corresponding increase in their financial resources, are themselves relying on devices such as stringent cost controls, staff cuts, efficiency reviews, the buying and selling of teaching materials and a greatly increased use of information technology to bridge the gap between costs and income. All of this can have a significant impact on individual academics. For example, the overpowering focus on research created by performance evaluation systems for both individual academics' promotion and institutional funding can lead to teaching - and teachers' feelings - being undervalued, or at least sidelined (Sikes 2006). Similarly, the imposition on HE teaching methods of educational technology tools simply as a response to massification, in the hope of saving costs¹¹, is also likely to lead to problems with university teaching – and with its teachers (Noble 2002).

In short, the climate at the time of this research was one of huge changes in the HE sector, all of which were likely to cause reactions in its teachers, and one of the challenges I faced in my research was to try to decide whether the responses I was identifying in my interviewees were due to some significant degree to the introduction of eLT into their teaching practices or whether they

¹¹ This was a common hope in the early days of eLT, but is suggested much less often nowadays.

were simply a result of the general turmoil being experienced by UK academics at this time.

2.3.2 The technological climate in UK HE

The prevailing climate at the time of my research was notable for significant changes in technology as well as in the HE sector. This was partly because of the impact of the internet, and all its associated technologies, on every walk of life. A further contributory cause was that, after a rather slow start, computers were now being taken up by universities with seemingly unbridled enthusiasm.

Although the first modern computers were invented before the Second World War, it is the last two decades of the 20th century which will be remembered as the time when computers really began to affect all aspects of people's lives in the UK. The situation in the HE sector is similar to this broader picture: the University of Manchester was the first UK university to have a computer, way back in 1948, but this hardly represented the beginning of universities actually using computers; it was an invention to be studied, not a tool to be used, for the university at that time (Napper, 2005). Even in the 1960s, when I was a mathematics undergraduate at Nottingham, computers were not common in HEIs and most students who wanted to use a computer, as part of their study programme, had to send coding sheets by overnight mail to the nearest university which owned one (in our case, to Manchester). And even this use was strictly for learning about (rather than learning with the help of) computers; they were certainly not used as teaching or leaning tools at that time. However, by the beginning of the 1970s, the idea of Computer Assisted Instruction (CAI) and ARPANET had arrived in America, so the foundations of the VLE and the Internet were still laid down over thirty years ago, at least as far as the US was concerned.

In the UK, an early computerised learning system called the Havering Computer Managed Learning System was developed around the same time and by 1980, it had been used by around 10,000 students and 100 teachers in applications which included science, technology and mathematics. The Open University was established in 1976 and soon offered a number of online courses (Cooper, 1980) and in 1981, the University of Sussex implemented an

interactive learning environment for computing and Artificial Intelligence (AI) students which included hyperlinked teaching materials and interactive demonstrations of AI programs. In other words, the ideas of computer-assisted teaching and learning, and the basic technology to realise it, had been around in the UK for over twenty years at the time of my interviews.

However, despite all this pioneering work, it was actually not until the late 1990s that university teachers in the UK really began to experiment with using VLEs and the Internet in their teaching methods. It was all the more remarkable, then, that by the time of my interviews¹², less than five years later, these environments were becoming common in universities and most teachers were expected to be at least conversant with them, if not already using them to support their teaching. This points to a huge change in the sector, happening over a very short period of time – to use the words of one of my interviewees, a "tidal wave" of technology had swept the sector, and not all teachers had been enthusiastic swimmers.

It is important to recognise that this research took place during a period of such intense technological change because the results I obtained might have been different, had technology arrived more gradually. I did not attempt to test this possibility in this investigation – that would have been a different piece of research – I simply record, at this point, that this was the situation.

2.3.3 Society in the new millennium

The last, and broadest, aspect of context which could have relevance to this research was the whole (world-wide) society in which the people, and the university, involved in this research are situated. There seems to be a substantial body of opinion that this is a time of fundamental change in the world, and many (see Chapter 3) ascribe this to the advent and spread of information technology. When seeking to understand the responses of my chosen cohort (that is, a set of particular academics in two particular universities in the UK), I needed to consider whether the reactions I was noting might simply be reflections of a broader phenomenon — a society-wide phenomenon in the UK, or even in a larger group such as "the developed

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¹²This was 2003/4. By 2010, many universities expect, or even require their teaching staff to use a VLE.

world" – or whether there were aspects of these responses which might be particular in strength or nature to the tiny society I was examining.

Two writers on the subject of this broader context seem to me to have particular relevance to the subject of this research: Manuel Castells in his trilogy on what he calls the "information age" (Castells 2000) and Sherry Turkle in her book about the effect of computers on the human spirit (Turkle 1987). In Chapters 3 and 9, I reflect on what Castells, Turkle and others say about the interplay between network technology, power, trust, politics and sense of identity in Society as a whole, and in Chapter 10 I reflect on the similarities between these findings at the 'macro' level of Society and my own findings at the 'micro' level of two universities. For the moment, I simply want to highlight the fact that this investigation was carried out at a time when writers such as these were identifying inter-related issues of power, status, identity and network technology in Society as a whole, and that this research took place in a sub-group of Society which, because its principal focus is the extension, contemplation and dissemination of knowledge, may be particularly affected by fundamental changes to the way knowledge can and must being handled.

2.4 Reflections

Most of this chapter has been written with the benefit of hindsight. Because my focus was not clear at the start of my research, I was not able to foresee what elements of context might be relevant to my investigation. But even if I had known my ultimate focus at the start, I doubt if it would have made a difference. All research has to have a context: if I had been a different type of person, chosen different interviewees from other universities or conducted my investigation in a different era, there would still have been effects from external factors — like Kvale, I believe there is no such thing as a neutral research context. I took measures to neutralise side-effects and I address in Chapter 4 how my results could have been affected by these factors. I allowed my interviewees' interpretations of eLT to determine exactly which educational technologies I would focus on, and obtained a coherent picture as a result. In the end, I can only present my findings as having been obtained within the context I have described, so that their similarities with, and differences from, other results in the field may be better understood.

3 The Literature

This chapter addresses the body of knowledge within which my investigation and findings are situated. I look first at the broad debate: the apparent effect of eLT on Society as a whole and whether it is expected to be *significant and beneficial* (McLuhan 1962 & 1964, Toffler 1970 & 1980 and Poster 1990, for example), *significant but sometimes malevolent* (Birkerts 1995, Barlow 1996, Everard 2000), a mixed blessing (Castells 2005, for example) or even, in the end, rather *insignificant* (Mumford 1964 & 1971, May 2002). Narrowing the focus, I move on to consider what has been said about the potential effect of networked technologies on the Higher Education sector, again looking at the views that it might be *significant and beneficial* (Blunkett in DfEE 1998, Duderstadt 2002, Clarke in DfES 2003 and Laurillard 1993, 2000, 2002, 2006, 2008), *significant but sometimes harmful* (Robins & Webster 1987, Noble 2002, Clegg 2005) or of *little consequence* in the long run (May 2002).

I then turn to the specific topic of HE teachers' responses to the introduction of these technologies in their working environment. I look at a number of quantitative studies from the United States (for example, Fredericksen et al 2000, Hislop & Atwood 2000 and Schifter 2000) and the United Kingdom (Sosabowski et al 1998, Haywood et al 2000) and qualitative studies (Almeida and Rose 2000, Arvan & Musumeci 2000, Kashy et al 2000 and others) from the same geographies. Other authors are referenced on topics such as intellectual property rights and plagiarism (Ashworth et al 1997, Gladney 2000, Flint et al 2006, Carroll 2007, Boyer 2010, and others); surveillance and privacy (Foucault 1977, Land & Bayne 1999 & 2002, Jones 2005, Dawson 2006, Joinson 2005 & 2008, Waldo et al 2007 and others); power and control (Henkel 2001, Holley & Oliver 2001, McKenna 2005, Bayne 2005 and others) and new organisational climate in HEIs (Webster & Robins 1989, Poster 1990, Usher & Edwards 2000, Jones et al 2000, Steel & Hudson 2001, Barnett 2004 & 2005, Deem & Brehoney 2005, Sikes 2005 & 2006, Goodfellow & Lea 2007 and others) which together add up to a picture of some confusion and uncertainty as to what effect eLT might have on HE in the UK.

Finally, I sum up the prevailing views of these publications and identify some areas where my own research will contribute to the debate.

3.1 The broad debate

3.1.1 Introduction

It has been claimed (for example, Duderstadt & Wulf 2002, Laurillard 2000) that digital technologies such as search engines, electronic mail and VLEs, will profoundly affect the university sector but there are various schools of thought about what sort of effect it might be. At the one extreme are those who fear that the widespread use of these technologies could threaten the very nature and role of our universities and their members. At the other extreme are those who suggest that the technologies will help HEIs to (re)claim their role as core institutions of Society. A third possibility, of course, is that it may make no significant difference at all in the long run (May 2000; Cutright 2000), that universities will absorb the new technologies and continue as they would have done without it for centuries to come.

One of the purposes of this investigation has been to contribute to this debate by considering teachers' feelings on the subject.

3.1.2 The information society

Much has been written in the last twenty years on information technology's potentially transformative effect, for good or ill, on Society as a whole.

Marshall McLuhan 1962 & 1964, Alvin Toffler 1970 & 1980, Manuel Castells 2000 & 2004, Mark Poster 1990 & 1995 and Bill Gates 1996 are among the many who argue that Society is being and will be significantly transformed by information technology. McLuhan and Toffler both compare the arrival of the computer with that of the printing press. The former argues (McLuhan 1962) that the combination of two particular results of the invention of printing in the fifteenth century – mankind's newly acquired ability to split information, or text of any sort, into "recombinable units" and its significantly enhanced capability to distribute knowledge – had a revolutionary effect, changing everything with which printing came into contact. He further concludes (McLuhan 1964) that the arrival of computers is having a similarly revolutionary effect on Society

today, with social structures, power balances and the ease with which information can be disseminated all undergoing a radical transformation, unlike anything which has been experienced since the 'Gutenberg revolution'.

Toffler 1970 takes the argument further in *The Third Wave*. He says that there has been two previous revolutions (the 'Agricultural' and 'Industrial' ones) in the way in which people have organised their economic affairs and that the Information Revolution is the third. Further, he claims that, as in the previous two Waves, Society will have been totally transformed when we emerge from the current transitional period. This transformation is and will be reflected in, among other things, a fundamental change in the sort of economic activities which will be valued and provide employment ¹³ (Toffler 1980).

Poster (1990) develops both McLuhan and Toffler's arguments further, claiming (May 2002) that different ages have different ways of communicating – face to face, oral exchanges, written exchanges using print, and electronically mediated exchanges – which then produce different types of societies. He maintains that the arrival of each of these methods of communication was a major stage of communication evolution, but did not lead to the replacement of its predecessor(s): each method was instead superimposed on previous methods, and each led to profound changes in Society such as, in the case of electronically mediated exchanges, empowerment of individuals above states.

Similar views are expressed by Bill Gates when he says "the global interactive network will transform our culture as dramatically as Gutenberg's press did in the middle ages" (Gates 1996:9) and by Manuel Castells, who claims that the computer revolution will be "at least as major an historical event as was the 18th Century Industrial Revolution" (Castells 2000:30).

Manuel Castells (2000) is probably the most well known proponent of the view that information technology has fundamentally transformed our society. The message of *The Rise of The Network Society* (*ibid* 2000a) is that information technology has produced a totally new form of society which brings significant

For example, teachers could become less valued, and their employment less secure, as predicted by Noble and others.

benefits to the individual (as opposed to the State or the "privileged few": see below). He claims that electronic linkages, from the interconnections of small groups of machines right up to global networks such as the internet, all support the development and dissemination of information to anyone who can access a computer, and thereby facilitate the spread of knowledge, enable adaptation and discovery, and empower all their users. He goes on to say that development processes have moved from being based on physical resources (generally owned by only a privileged few) to an increased reliance on the mobilisation and coordination of knowledge and information, now available to almost everybody, and that this has transformed the nature of work, with labour becoming less standardised, flexibility becoming the norm and the working class becoming 'individualised', and has brought similarly dramatic changes to the very character of Society.

It is worth noting here that my interviewees did not, in general, support Castells' view that the technology has enabled labour to become "less standardised" and workers to become "individualised", at least in HE. One of their fears was that eLT would, in fact, enable HEIs to *standardise* teaching materials (for example, by purchasing 'master classes' from other universities) and thereby *reduce* their and their courses' individuality.

Commentators such as these on how information technology is changing Society vary in the extent to which they see its effect as generally beneficial, mostly malevolent or somewhere in between. Castells' attitude, for example, is described in May 2002:12 as follows: "For Castells, the information age is not an unalloyed good: the world is being brought closer together through the enhancement of communication but there is also increasing evidence of social fragmentation and dislocation .. [and] society has moved towards .. a commercialisation .. of the spaces of communication". However, most writers consider that the effect has been highly significant. May 2002 disagrees, arguing that the technology has not brought, and will not bring, a revolution nor even fundamental changes to Society principally because, he claims, Society is still based on ownership of property (although this is often intellectual property these days). He states this position right at the start of his book, maintaining that "our ideas about society, which have taken so long to develop

and refine, are not immediately invalidated by the information society. It is not the ... dawning of a new age." (*ibid*: viii). Similarly, Mumford 1971 claims that computers have had an evolutionary, rather than a revolutionary, effect on Society because new attitudes and practices, brought about in response to the rise of information technology, simply co-exist alongside those which had previously existed, rather than replacing them. Clearly, therefore, there is a broad range of opinion on the effect of this technology on Society as a whole which is mirrored, to some extent, in the range of views I encountered on the likely effect of eLT on Higher Education.

3.2 Technology-supported teaching

The above section looked at some literature on the effect information technology is having, or might have, on Society as a whole for two reasons. Firstly, such observations and predictions might also hold true for particular sub-societies within Society, such as Higher Education, so it may be possible to take findings and conclusions from research related to the larger groups and apply them to the smaller one. Secondly, and conversely, when studying my chosen sub-society (Higher Education), I need to be clear which phenomena might be particular to that society and which might simply be local manifestations of the general phenomena.

This section, then, explores what has been said in the literature about how eLTs (that is, some particular types of information technology) are affecting, or might affect Higher Education in general and in the UK in particular.

3.2.1 Universities as information societies

For me, an interesting extension – or particularisation – of the writers' works discussed in the previous section is the matter of whether or not their observations or predictions are reflected in the special 'society' of Higher Education, or even that of in an individual university. As previously discussed, a university's principal reason for existence may be said to be the creation and dissemination of knowledge. Most writers claim that a major effect of the introduction of information technology will be to make information (and therefore, perhaps, knowledge: see Chapter 7) either more freely available to

all (the so-called 'disclosing dynamic': Mumford 1964) *or* more likely to be owned and restricted by individuals and organisations (the 'enclosing dynamic': *ibid*). In order to explore this further, it is necessary to compare the realised and predicted effects of information technology on Society as a whole with those in the 'knowledge-production-and-dissemination society' of a university.

Even at first sight, there are some obvious areas where the effects which writers have noted – or predicted – that information technology will have on Society as a whole might also apply in a 'university society'. For example, when May is systematically setting out arguments for and against the proposition that computers have had a significant effect on Society (May 2002), the issues he considers – including knowledge ownership, power, privacy and self-image – all have potential to be issues for university teachers. Similarly, Mumford's ideas on 'enclosing' and 'disclosing' dynamics, McLuhan's views on the way the arrival of computers will transform power balances and Toffler's predictions that information technology will change the types of economic activities (university teaching, for example) which will be valued, all reinforce for me the idea that there is potential for extending these predictions into the particular world of Higher Education.

3.2.2 Information technology in HE

As a result, I looked into the particular 'society' of Higher Education for examples of similar ideas and opinions as I was finding for Society in general: that information technology in general, and eLT in particular, *will* make a significant difference to universities, for good or for ill ... or that it will not.

In the main, I found a large number of writers who felt that eLT will be seen by posterity to have had a very significant impact on HE and rather fewer who felt it would have little or no significance. A succession of Education Secretaries, for example, has declared their firm belief in the transformative potential of information technology when used in Higher Education. Charles Clarke, in his forward to *Towards a Unified e-Learning Strategy, Consultation Document*, claims that "e-learning has the power to transform the way we learn" (DfES 2003:1) and David Blunkett, in his *Response to the Dearing Report (DfEE 1998;* Ch. 7 banner statement) declares that "Communications and information

technology offers opportunities to increase the effectiveness of learning and to provide improved access to higher education. All those concerned with the delivery of higher education have a responsibility to seek to ensure that the benefits of communications and information technology are exploited as fully as possible." Neither Blunkett nor Clarke, however, offers any evidence to support these claims; they just appear to take the transformative effect of, and the obligation to use, information technology in Higher Education as a 'given'.

By contrast, James Duderstadt, of the University of Michigan, bases his (similar) predictions on a study undertaken under the aegis of the American National Academy of Sciences. Duderstadt describes three conclusions reached by the study: that "the extraordinary evolutionary pace of information technology will not only continue for the foreseeable future, but that it could well accelerate on a super-exponential slope"; that "the impact of information technology on the university will likely be profound, rapid and discontinuous ... [but], at least in the near term – meaning a decade or less – the university will continue in its present form"; and "universities should begin the development of their strategies for technology-driven change with a firm understanding of those key values, missions and roles that should be protected and preserved during the time of transformation" (Duderstadt 2002:3).

Robins and Webster, on the other hand, while accepting that information technology will affect universities, argue *against* the assumption that educating people in and through it will necessarily be good for them or for society (Robins & Webster 1987). In the course of their argument, they express concern about the possible effects of the introduction of information technology into Higher Education. For example, they claim (*ibid*:149) "Management has ... developed techniques – first organisational, later technological – which have ... made [them] less dependent on their employees by reducing skill ... or keeping skill requirements to an absolute minimum. The upshot has been the allocation of demeaning, 'low-trust' roles to the bulk of workers." This reflects the fear expressed by Noble 2002a:4, that:

"teachers as labor are drawn into a production process designed for the efficient creation of instructional commodities, and hence become subject to all the pressures that have befallen production workers in other industries undergoing rapid technological transformation from above. In this context faculty have much more in common with the historic plight of other skilled workers than they care to acknowledge. Like these others, their activity is being restructured, via the technology, in order to reduce their autonomy, independence, and control over their work and to place workplace knowledge and control as much as possible into the hands of the administration. As in other industries, the technology is being deployed by management primarily to discipline, de-skill, and displace labor."

Both these writers, and some others (Clegg *et al* 2003 for example; see Chapter 6) foresee perils for Higher Education from the introduction of information technology, from the 'disciplining, deskilling and displacing' of university teachers mentioned above, with consequent effects on the staff, to the deterioration of quality in university teaching and learning, to the disadvantage of their students.

3.2.3 Summary

Clearly, the researchers' views quoted above on the likely impact of information technology on HE are as diverse as those being expressed about its effect on Society at large, although most felt that this impact would be, and is already, significant. However, few of these writers had much to say about how HE teachers might be impacted, or how they might be responding, or expected to respond as a result¹⁴. For this, I had to look elsewhere.

3.3 Teachers' responses to e-learning technology

As previously noted, I found at the start of my research interest that a great deal of attention had been paid to *students*' reactions to the spread of educational technology in university teaching but rather less to those of their *teachers*. In addition, the research that I did discover was very varied in domain, scope, method and conclusions. This section describes some examples of the views I found expressed on this subject.

3.3.1 Types of studies

The first thing I noticed in my literature search was that the work which I found seemed to be broadly classifiable by methodology (qualitative or quantitative) and/or country (US, UK, or other).

Chapter 3: The Literature

¹⁴ Clegg *et al* and, of course, Noble being exceptions to this

US-based research, at that time, had definitely polarised into two types:

- Predominantly quantitative studies (the majority), based on comprehensively analysed data from very large surveys, such as Schifter 2000, Fredericksen et al 2000, Hartman et al 2000 and Pollicino 2000.
- Predominantly qualitative studies (relatively few), generally based on interviews, such as Almeda & Rose 1999, Arvan & Musumeci 1999, Kashy et al 2000 and Turgeon et al 2000.

The situation seemed to be a little different in the UK where the (rather smaller) amount of research related to teachers' responses to eLT had only infrequently been based on the large, questionnaire-based surveys which were favoured in America. A few UK researchers had used statistical methods, generally backed up by interviews and documentary sources (for example, Sosabowski *et al* 1998 and Haywood *et al* 2000) but the majority had used qualitative methods, often including interviews (Jones *et al* 2000, McKenna 2001 & 2005, Steel & Hudson 2001 and Smith & Oliver 2002, for example.).

Many of the earlier studies, particularly in the US, were described as investigations into "staff satisfaction". However, in none of these studies was there a common view of how to define the objectives, expectations and needs of university teachers nor on how best to determine, express or measure the 'satisfaction' of these. Much of the earlier research focused only or principally on the teachers' desire to improve the quality of their teaching and their pupils' 'student experience'. While this is certainly the most important need for many (or perhaps most) teachers, I suggest that there are other needs which must also be met if teachers are to feel fully satisfied with their jobs.

3.3.2 US-based academics' responses

As noted above, much of the early research into academic staff's responses with the use of eLT for university teaching has been couched in terms of their "satisfaction" and some of it has tried to establish the causes of these responses. Suggested causes of teachers' dissatisfaction with the use of eLT include: lack of technical skills; work load increases; role conflicts between academics and administrators; loss of control as courses come to depend

more on administrators' support; not being warned about online teaching when appointed; the proper functioning of the technology; their use of eLT not being given due recognition; not being able to see and hear students; and conflicts or miscommunications with students (Kashy et al 2000:6-7, Hislop & Atwood 2000:1). Likewise, causes of satisfaction include: positive interactions with students who see the teacher as mentor rather than judge; increased collegiality with other departments and disciplines who are using eLT; the ability to really see how students are doing, especially before tutorials; greater interaction with students (especially via e-mail); and positive feed-back from junior staff whose work had moved from "grading and record keeping" to "Socratic interactions with students" (Hislop & Attwood). The most interesting to me of these themes are those related to teachers' roles and loss of control, which both feature in later chapters of this thesis.

I note here that Atwood expresses his personal confidence that eLT *will* improve the quality and outreach of university teaching, while decreasing the time and effort involved, and offers his own meaning of 'satisfaction' as being the state where he can "accomplish what I intend to accomplish with a reasonable amount of time and effort" (*ibid* 2000:8). However, as his suggested factors to enable this satisfaction are related purely to the technology, it seems he holds the technologist's faith that eLT can improve everything in time, simply by becoming more refined, which is not a view I can subscribe to.

Catherine Schifter, like Kristen Betts in a previous survey (Betts 1998), used twenty-nine motivating factors and seventeen inhibiting factors which were thought likely to affect academics' willingness to use eLT (Schifter 2000:2). The former included many of Herzberg's satisfiers and motivators and the two lists together could be interpreted as factors affecting satisfaction of faculty actually using such technology. However, Schifter's conclusions (such as that the top five motivating factors for participants (*ibid*:3) were: "personal motivation to use the technology; opportunity to develop new ideas; opportunity to improve teaching quality; opportunity to diversify program offerings; and greater flexibility for students") were presented in a form whose prime purpose was to clarify attitude differences among lecturers who currently

use the technology, those who do not, and senior managers. Furthermore, the importance of many factors was found to differ significantly between groups of participants so the results were considered inconclusive for the sample as a whole. Hence, I found this research difficult to apply to general questions of staff responses to eLT in the UK.

An illustration of extreme and very clear demonstrations of university teacher dissatisfaction, and some potential consequences, may be found in *Digital Diploma Mills* by David Noble (2002). Noble focuses on overt expressions of teacher satisfaction — or rather, the lack of it — such as Canada's York University teachers' two-month long strike over the institution's proposed introduction of eLT into their teaching practices. His work is based on concerns over intellectual property rights, job security, pay and working conditions and general degradation of the teaching experience, all related to the introduction of e-learning technology into university teaching.

Some of Noble's predictions and fears might seem somewhat alarmist now—the average university has *not* become "a Taylorized organization obsessed with automating to improve the bottom line" (*ibid*:2), a major market in 'courseware' has *not* been established, swathes of academics have *not* been made redundant in favour of computerised instruction, and there is *no* evidence of teaching standards being lowered because of the advent of eLT. None of these things has happened—at least, not yet. But there is still time—it is only 12 years since Noble first raised the alarm—and anyway, his alarm-raising may have made a contribution towards preventing the catastrophe he predicts. His work is important here, however, because many of his issues, including academics' loss of ownership of their own work and of control and authority, were raised as concerns by my own interviewees, seemingly, independently of Noble's work, which none of them claimed to have read. His predictions may not have come true (yet) but they nonetheless deal with matters which concerned many of the HE teachers to whom I talked.

3.3.3 UK-based academics responses to eLT

I found UK-based research on academic responses to eLT to be considerably less in (published) volume than that relating to the US but rather more diverse in its scope, perspectives, research methods and results.

An early example of a limited sample, mixed-methods investigation into the introduction of eLT is that of Sosabowski *et al* 1998, who use a small, questionnaire-based survey, supplemented by informal interviews, to identify hurdles to the implementation of eLT-based teaching methods in the University of Brighton's School of Pharmacy and Bio-molecular Sciences. Whilst most of the questions, at least in their questionnaire, are strictly factual (example: "What do you use e-mail for?"), a few concern the staff's "attitude" to eLT and its use in teaching and learning, and their "critical responses" towards, for example, modules taught entirely via the web (*ibid*:3-4). The results of these questions are presented in bar/pie charts and quotations and the study is thereby able to report briefly on staff perceptions and attitudes – for example "it appears that staff are unwilling to carry out what appear to be tasks over and above their contract" (*ibid*:5) – but without any more detail on such interesting conclusions. ¹⁵

By contrast, Becher & Trowler 2001 is not overly concerned with the effects of eLT, focussing instead on effects on HE teachers caused by changes in HE structures and cultures, but it does briefly consider the former and cites effects including "work intensification, degradation of working conditions, bureaucratization and power shifts towards managers and administrators" (*ibid*:12) caused at least in part, he claims, by the introduction of the technology. He also quotes Rhoades 1997:265 as follows¹⁶:

'Instructional technologies are more than just new methods of delivering instruction. They are means by which managers can bypass full-time faculty's influence and claims on the curriculum ... managers are creating a curriculum realm over which they have more discretion and control [than the academics]"

Another early study into reactions to change in UK HE may be found in Haywood *et al* 2000, this time with a broader range of stakeholders (academic

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¹⁵ Notably, I found no evidence of similar reactions in my own interviewees.

staff, members of computer-assisted learning and staff development units and senior managers, all in Scottish HE institutions), a mixed methodology and a focus solely on responses to eLT. Haywood investigates these stakeholders' views on the Scottish Learning Technology Dissemination Initiative through the use of a very large survey, supplemented by face-to-face interviews and documentary sources. The conclusions were that most of those who were surveyed believed that: "learning technologies had a moderate to very high potential for improving the way in which students learn"; the value of eLT "lay in the implementation or maintenance of quality rather than creating efficiency gains", but "there are still significant barriers to its uptake by staff, the most important being lack of time, infrastructure, software and training, plus a failure (perceived or actual) of institutions to value teaching". The report did not comment on any other effects the introduction of eLT might have on HE teaching staff but one may infer from these conclusions some of the reactions (a belief in eLT's potential for benefit, coupled with concerns about, for example, the reduced/ing status of teaching) evinced by my own interviewees.

One investigation which uses rather different methods is Smith & Oliver's 2002 study into the attitudes of HE academics to the introduction of eLT. They also include policy makers, along with teachers, in their investigation of attitudes. Like Sosabowski et al 1998, they base their research on a small number of interviews but supplement this with material drawn from the Dearing et al 1997 and other government reports rather than questionnaires. They then use discourse analysis to identify the discursive repertoires of university teachers and policy makers in discussing the impact of educational technology. The results report types of statement commonly found in the discussions and published material and providing an insight into the agendas of different groups with an interest in eLT in HE. Some of these insights are related to teachers' feelings about eLT – for example, one of the interviewees enthuses about the "benefits of technology", from which one could infer some satisfaction with its use, but then complains about the "burden" of web-page creation and maintenance, thereby implying a degree of dissatisfaction with this technology (ibid:243). The analysis of the reports also sheds light on

¹⁶ Rhoades, however, is a US academic who may not be reflecting UK concerns of the time.

policy makers' expectations (students as passive subjects "developed" by HE, lecturers as "materials developers", universities' role being to "aid nations to compete" and education being "the purchase of learning outcomes", for example) which set of attitudes could themselves impact teachers' feelings about their role in HE and how this might be changing.

Another example of the use of a rather different methodology is that of Jones et al 2000 who use a phenomenographic approach, grouping their observations into categories describing different ways in which university teachers "experience" network learning. Their findings (related, for example, to course structures and reaction to low student participation in e-learning initiatives) shed light on their interviewees' feelings about their use of eLT in their teaching practices, including "a common philosophy held by current [eLT] practitioners ... but a lack of 'rules of thumb" and "caution about specific design outcomes meeting expectations". Again, they made no other comments on the potential effect on HE teachers of the new technologies.

A further example of a UK investigation into "lecturers' perceptions and experiences of educational technology" may be found in Steel & Hudson's 2001 study, which uses "free and open-ended discussions" (as I do) and reports the emerging themes in narrative form (again, like me). Their findings are grouped under six themes, including "notions of value or benefit of educational technology" (*ibid*:105) and "drawbacks of using educational technology" (*ibid*:106). Among the former are remarks such as "you could make a lot of the routine aspects of teaching much more efficient", "it made the units come alive" and "they can manage the learning process in their own ways" (*ibid*:105), all indicating enthusiasm for a decrease in routine work and increase in learning quality and flexibility. The reported "drawbacks" include concerns over teachers' loss of control, reduced job security and the fragility of the technology (*ibid*:106). All of these reactions were mirrored in my own interviews (although I group them into themes in a rather different way from Steel & Hudson 2001) and are discussed in later chapters of this thesis.

¹⁷ Steel & Hudson's own description: p104

A rather different study, in that it was primarily concerned with surveillance and power, was reported in Land & Bayne 2002. It primarily relates to students but includes a brief mention of teachers (*ibid*:11), pointing out that teachers can easily be monitored in an on-line environment and risk losing power upwards (to their managers) and downwards (to their students) when using eLT. Noble's view had been that loss of power and of privacy would lead to considerable academic unease but Land & Bayne's concern, conversely, was that UK teachers were not uneasy *enough* over this possible surveillance and power shift, and should be more aware of the dangers associated with eLT. This is another topic to which I return in Chapters 6-10, after my own interviews.

I conclude from these studies, so varied in scope, methods and outcomes, that UK-based research into university teachers' responses to eLT was, at the time of my own investigation, somewhat sparse, fragmented and difficult to put together into a coherent picture of what teachers actually feel about these technologies. Some concerns about, for example: increased workloads; reduction in control; authority or job security; surveillance; role definition; and the need for more training were useful but a clear picture does not emerge from this review.

3.3.4 Other stakeholders' responses

Although I eventually focussed my review on US and UK-based investigations into *teachers*' responses to eLT, I did take note of some publications relating to other HE stakeholders which I felt may be relevant, because of my belief that unease in any one group of stakeholders is likely to affect the rest.

Some examples included Kashy et al 2000, Noble 2000 and Warschauer 2000, who all give examples of academics' tensions with managers and administrators over educational technology. Kashy says (Section C): "An interesting observation concerns the role conflict that occurs at the intersection between faculty and administrative domains of responsibility. .. Our experience is that implementation of ... [eLT] on a large scale in teaching has greatly increased the domain where administrative and academic responsibility and control intersect [and] we have experienced numerous situations that

engendered faculty dissatisfaction", and she proceeds to describe four examples of such situations. Warschauer describes four teachers' experiences of being early users of eLT in their HEIs, including some reactions of other stakeholders (managers and administrators) who withheld promotion, or otherwise criticised, two of the teachers concerned for not 'teaching properly' because they used eLT. Noble gives many examples of managers' and administrators' responses to eLT, mostly in terms of their tendency to focus on its potential commercial benefits to their HEIs and their lack of consultation with teachers and students over its implementation. Schifter 2000 compared teachers' attitudes to technology with those of administrators (finding, for example, that the latter often liked eLT because it increased their job satisfaction whereas many teachers felt it decreased theirs) and Maguire 2005 reviews some 13 publications on faculty attitudes to eLT, concluding that managers and administrators have similar concerns to those of academics over its introduction, including potential threats to job security, to course quality, and to their "scholarly respect" (ibid:3).

In the UK, Smith & Oliver 2002 describe "the complex congruence and divergence between the beliefs of [eLT] experts and those of university teachers" (ibid:237), concluding that some eLT-related roles, such as 'materials developer', are contested between them. Haywood et al 2000 specifically addresses university managers and service providers (e-learning support staff) as well as teachers, concluding that all three groups believed that eLT had a valuable role to play but that support staff were pessimistic about most academics' willingness to use it and managers were not yet valuing eLT skills sufficiently in staff appraisals and promotion boards. Bacsish 2000, on the lifecycle costs of networked learning, contributed to the debate on the satisfaction of university managers and funding bodies with eLT (costs were generally expected to be far higher, and savings generated by eLT far lower than these stakeholders had hoped for, leading to some dismay in the sector) and Harvey 1999 addresses the issue of employers' expectations of their graduates, finding that increased use of eLT in university teaching was generally welcomed by employers, who felt that the students would gain useful skills as a result.

In summary, rather little had been published at the time of my investigation on the reactions of HE stakeholders who are not students or academics, giving insufficient data for comparisons to be drawn between the responses of these groups. Nevertheless, some of these results still have relevance to teachers' responses, as discussed further in Chapter 10.

3.4 Knowledge ownership

Preamble

During my review of the literature on HE teachers' responses to eLT, it became clear that there were a large number of different opinions, not only about how teachers are responding (Sosabowski et al 1998, Trowler 1998 and so on), but also about why this might be the case (Jones et al 2000, Steel & Hudson 2001, Land & Bayne 2002). In all the analysis and speculation around these questions, a number of threads seemed to wend through the books and papers I read, including the importance of eLT training and support (Haywood et al 2000), teachers' deteriorating employment conditions (Noble 2002), the need for new approaches to pedagogy and practices (Goodfellow & Lea 2007), and a broad group of topics relating to teachers' feelings on such matters as their changing status, role, privacy, and intellectual property rights (Morgan 1994, Barlow 1996, Ashworth et al 1997, Simpson & Perry 1999, Gladney 2000, Henkel 2000, Newmarch 2000, Bayne 2005 and many others). In the light of the themes which subsequently emerged from my interviews, I describe here some of the literature I encountered on five of these latter themes: control; knowledge ownership; privacy; trust; and university teachers' sense of identity.

3.4.1 Introduction

The general theme of *knowledge ownership*, including issues of intellectual property rights and of plagiarism, has always been keenly debated, ever since the earliest writings on knowledge and learning. However, the introduction of eLT and, in particular, the growth in the use of Virtual Learning Environments, have made the debate more acute. This is because eLT has significantly affected the ease with which plagiarism and intellectual property rights

violations can be effected and, in recent years, can be detected¹⁸. I therefore review here some of the research that had had been published on this subject.

The literature seems to divide into work about plagiarism and work about intellectual property rights so it seems appropriate to treat the two subjects separately, even though they might be seen as just two sides of the same coin – or in the more poetic words of Jim Evans, as "kissing cousins" (Evans 2000:3).

3.4.2 Plagiarism

Much has been written on the subject of plagiarism in recent times, but most of it seems to be concerned only with plagiarism by students, rather than university staff. A typical example is "Collegiate Dishonesty Revisited" (Lambert et al 2003) which, despite the inclusivity implied by title, makes no mention of such dishonesty by anyone other than students. Its authors considered twenty types of dishonesty of which two - "copying a paper from a file or obtaining a purchased paper and presenting it as your own original work" and "using materials from another student's paper without giving bibliographic credit" - pertain to knowledge ownership. Despite the broad objectives of the study implied in its title, the enormous amount of data it considers and the sophisticated statistical analyses which were performed, the study's results and conclusions (that "only college level, membership of a fraternity or sorority, cheating to graduate, cheating to get a better grade, and past cheating in high school had a significant effect" (ibid:1) on whether or not pupils cheated, are difficult to interpret in the context of how eLT has affected student plagiarism and how UK academics are responding to this. The most useful observation I derived from this study, in fact, was the absolute lack of recognition (even in the paper's huge literature review) that academics might either act dishonourably themselves, or may have different views on student plagiarism than those adopted by the authors of the paper¹⁹.

In both cases, the technology aids both the <u>infringement</u> and its <u>detection</u>, but not always in equal measures.

That is, that <u>all</u> copying without accreditation is cheating and that cheating is never condoned by university teachers - which views were not always shared by my interviewees.

A similarly titled paper reporting on cheating by UK students (this time, the title specifically restricted the subject matter to students) did include some consideration of academics' reactions to such student behaviour. Its authors (Franklyn-Stokes & Newstead 1995) first pointed out the "rather curious" fact that "the not inconsiderable literature appears to be exclusively North American" (ibid:159) and went on to acknowledge that some behaviours "such as failing to acknowledge all one's sources, may be more ambiguous" – that is, not seen as cheating by all teachers. This would seem to be a more open approach than that taken by Lambert's much more recent study. The most interesting results, as far as my own research was concerned, from Franklyn-Stokes & Newstead's work are that plagiarism was generally considered as a very minor misdemeanour by students but a fairly major one by staff and that this was one of the biggest gulfs between students' and teachers' attitudes to cheating.

I found a number of papers on the same or similar topics. Stephen Davis et al 1992, Barbara Davis 1993 and Jocoy & DiBiase 2006, in common with Lambert et al and most other American writers on the subject, concerned themselves mainly with the detection or prevention of students' plagiarism. In the UK, however, some papers such as Ashworth et al 1997, Evans 2000, Carroll & Appleton 2001, Stefani & Carroll 2001 and Christe 2003 focus on strategies such as rethinking course design, teaching academic citation skills and rethinking assessment, rather than better detection, and acknowledge varieties in attitudes of academics to what, exactly, constitutes plagiarism and what should be done about it. Similarly, the set of three papers about student cheating and plagiarism²¹ given at the Oxford Centre for Staff and Learning Development's 2002 symposium on improving student learning (Carroll and Peperel 2002, Freewood et al 2002 and Cogdell et al 2002) also all focus on student plagiarism (which was, after all, the focus of the symposium) but acknowledge that there are implications for teaching staff too and that better detection is not the only, or even necessarily the best, answer to the problem.

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Although this was ten years prior to my own literature review, the situation had not changed much in the intervening years.

Notably, cheating and plagiarism were not treated as synonyms in the symposium's title or its content.

Some similar views – and one slightly more radical one – have emerged from Australian researchers. Greta Thompson (Thompson 2000) deplores HE students' flawed referencing skills (as evidenced by incorrectly referenced or non-attributed passages in their work) and attributes this partly to the actions and attitudes of their teachers. Similarly, in Anon 2006, an article on the University of Sydney's official web site, the writer observes that "studies of student plagiarism have found clear differences between students' and teachers' views of cheating" and quotes one of the most common factors influencing intentional plagiarism as "condoning teachers". More radically, Kim Morgan titled her conference paper "Plagiarism: does it matter?" (Morgan 1994) and set out a measured case for celebrating, rather than condoning, plagiarism – for example, by likening the belief that information is the property of everyone to purists' attitudes to "Utopian communism" (ibid:1) - before going on to demolish the argument again by means of similar arguments to those wielded by other writers referenced above. She does not explicitly state that the plagiarism she is concerned with is only undertaken by students (but generally implies it) and again, she recognises differences in teachers' attitudes to student plagiarism. Finally, like others in the UK, she recommends some approaches other than keener detection and punishment to deal with the problem.

Among more recent writers, I found more disagreement with the traditional view of how student plagiarism should be judged. For example, Sutherland-Smith & Pecorari 2010, presenting to an international conference on plagiarism, criticised current attitudes as "quasi-judicial", achieving little to prevent plagiarism, and "conflating plagiarism and cheating", thereby causing "many poor writers [to] end up in disciplinary process in error" (*Conclusions* slide). Furthermore, there are some signs of acknowledgement that this is not simply a student issue: Laura Boyer, in an article on plagiarism on her university library services' web page (Boyer 2010) remarks: "Unfortunately, students are not the only persons plagiarizing today. This section contains some articles on the state of plagiarism among historians, authors, and faculty", followed by some 26 links to news stories (but none to academic papers) about plagiarism by HEI teachers and researchers. Likewise, Ursula McGowan,

in a conference presentation (McGowan 2005) argues strongly for resolving plagiarism issues by means other than electronic detection and punitive reaction.

It is very noticeable how the discourse surrounding plagiarism has been affected by the introduction, first of eLT which made plagiarism easier and then of detection software such as *Turnitin*, which is designed to prevent it. Many of the above writers (such as Lambert *et al* 2003 and McGowan 2005) refer to either or both of these effects of technology on plagiarism and a few, such as Donnelly *et al* 2006, address the ethical issues, including potential infringement of student intellectual property rights²², which surround the use of *Turnitin* and the like. The point being made here is that the use of such tools is not only potentially unethical, it also implies an automatic mistrust of students, inhibits their writing, and is anyway not the only, or even the best, way to discourage plagiarism.

To return to my review of the literature, the only work I found which specifically focuses on academics' *feelings* about plagiarism was Flint *et al* 2006 "*Exploring staff perceptions of student plagiarism*". This confirms what a number of others in the UK had suggested before – that a variety of views of plagiarism (regarding both what it is and how much it matters) exist among HE stakeholders – and emphasises the need for further research in this area.

My conclusions from all these studies were that plagiarism is a very contested area of behaviour, that few researchers (if any) appear to consider plagiarism by people in universities other than students, and that researchers in the UK, at least, are open to the ideas that teachers may have varied attitudes to the subject and that there could be other responses than simply trying harder to prevent, detect and punish it.

3.4.3 Intellectual property rights

In general, the literature related to issues over intellectual property rights (IPR) in Higher Education appears to be distinct from that dealing with plagiarism. More than that, just as the plagiarism-related literature generally seems to

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²² *Turnitin* adds every document it checks to its database, for use in future detection, which may infringe the IPR of the writers concerned.

assume that this is solely a *student* offence, not committed by teachers and researchers, the books and papers on IPR mostly seem to assume that this only concerns *academics*, students apparently having no intellectual property rights worth talking about.

On copyright in general, Henry Gladney's comprehensive treatise (Gladney 2000) on digital IPR in America clarifies the issues and the legal position there. In summary, he points out that modern concerns with 'freedom' (of speech, of information, and so on) are at odds with people's desire to be properly rewarded for their labours, that intellectual property legislation generally gives more protection to large corporations than to individuals, that electronically-based 'property', and its owners, are hard to 'nail down' and that none of this is new, although it may have been exacerbated by the advent of information technology. Like Waldo *et al* (see section 3.6.2 below), Gladney is more useful for defining the issues than for finding solutions; a necessary function, but not much help in addressing the problems that are arising with respect to HE teachers' IPR and eLT.

Many universities (especially in America) have explicitly declared their policy regarding individuals' rights to own the materials they create versus the rights of the HEI which employs them. For example, the Academic Senate for the California Community colleges published a 29-page paper on the subject over ten years ago (Simpson & Perry 1999), explicitly addressing the issue (*inter alia*) of academic freedom. It discusses the problem at some length, starting from the standpoint that teachers' IPR over the syllabus and course materials they generate has historically been accepted but that the course description, as held on file by the HEI, belongs to the latter, regardless of who generates and updates it. It then points out that:

"In the days of dittos and mimeographed handouts, this understanding, vague as it might be, was perhaps sufficient. With the advent and exponential growth of current technologies from email to online courses, multimedia course materials, and computing work as part of interactive education, the old understanding is seriously deficient. Teachers (and students) are not adequately protected in two ways: they may not be able to preserve their own original work and they risk violating the protections of others when they use others' works."

Here, it touches upon two aspects of the IPR issue which are usually dealt with separately: course ownership (does it rest with the HEI, the teacher, or with no-one?) and the unauthorised use of an academic's works by other academics (which can cause concern to both the owner and the user). Both of these issues surface during my interviews and are returned to in Chapter 7.

It makes another point which I have not seen elsewhere when it quotes the following paragraph from an report issued by the American Association of University Professors concerning academic freedom and eLT (AAUP 2004:1):

"One overriding principle should govern such inquiry: freedom of expression and academic freedom should be limited to no greater degree in electronic format than in printed or oral communication, unless and to the degree that unique conditions of the new media warrant different treatment."

This seems an eminent criterion which could usefully be applied to most areas of the IPR debate, even if the final caveat somewhat dilutes its power.

I did find evidence of concern for *students'* IPR in a set of overheads produced by University College London (UCL)'s Library Services Department (Reid 2005 and Ayris 2005) which specifically address this matter, pointing out that students are "producers as well as consumers" and that IPR rules are therefore "a means of protecting [their] own work" (Reid slide 4). They clarify the rules (including UCL's recognition of the students' ownership of any IP he/she produces while at UCL) and point out some advantages to the students of following these but do not enter into discussion of the issues concerned.

In summary: the papers generally agree that the legal position on academic IPR is unclear; not every university has explicitly declared its own stance; and those declarations which have been made still leave room for a reduction in academics' rights over the materials they create. My own interviewees' views (Chapter 7) mirror all these points, particularly the lack of clarity in this area.

3.4.4 Ownership of 'courseware'

The topic of the ownership of an academic's course materials covers questions such as: does the university own the course materials a teacher produces; might they trade (buy and sell) these; and might they perhaps

control the teacher's own use of them, for example by prohibiting their use if the teacher leaves the HEI at which they were being developed (or simply most recently used)?

Simpson and Perry 1999:10, in its philosophical section on copyright says the US legal position is that copyright protection is afforded to an academic over his works only until they take "tangible form" (for example, become Web-based course materials) when they may under certain circumstances – which might apply to HE teachers' development of their courses – become works 'made for hire' and hence the property of the creator's employer (the HEI). The authors conclude that "course materials and other documents and materials created in the line of teaching courses have an ambiguous status" and that "The need for ... agreements regarding copyright ownership is clear" (*ibid*:11)²³. It is in regard to these very institutional policies, however, that concerns have arisen: the thinking is that an HEI which explicitly declares its IPR over course materials is planning to control or restrict a teacher's use of them – and it is this which is causing unease.

The position is similarly ambiguous under English law. The official guidelines to UCL staff on copyright issues state:

"UK Copyright protects any piece of original work as soon as it has been recorded either on paper, in an audio recording, on film, or electronically. ... In the first instance, the "author" owns the copyright. ... [but] where work is produced in the course of employment, an employer may hold copyright, or will seek license to use work". (UCL 2006a)

As a result of this ambiguity, many HEIs have now explicitly declared their copyright policy. For example, UCL's Policy (UCL 2006b) is that "UCL recognises the rights of its staff to ownership of [and] copyright in ... teaching materials in all formats" and makes exception only for: institutional materials (for example, syllabuses); materials generated by prior agreement for which UCL provides resources in excess of those normally provided; and materials generated by prior agreement as ventures which involve sharing of copyright ownership between UCL and members of staff. Although this seems clear enough, UCL has considered it necessary to add a further two pages of

Note: Dearing made exactly the same point (Recommendation 43) but the situation does not seem to have improved in the subsequent 13 years.

clarification, caveats and commentary, which would not have been necessary had the legal position been less ambiguous or the issue less of a concern for teachers and the College authorities.

David Noble was one of the early writers to sound the alarm about the possibility of HEIs claiming, then restricting, control of teachers' course materials and he devotes a chapter to the matter in *Digital Diploma Mills* (Noble 2002). The gist of his argument is that universities are poised to claim IPR of all materials produced by their (full or part time) staff and trade them with each other, thereby restricting what academics can do with their own work and eventually endangering academics' jobs as well as their intellectual freedom. He ends the chapter with a resounding call to arms:

"Only by resisting and opposing university control over copyright will faculty be able to preserve their legal rights, their autonomy, their jobs and, above all, the quality and integrity of higher education".

While this may seem over dramatic, and these predictions have not been realised in the decade since Noble made them, they are nonetheless logically possible and were echoed, with some concern, by several of my interviewees.

Jan Newmarch voices similar concerns in her paper "Who owns University Web Courseware?" (Newmarch 2000), claiming that the push by universities to put course materials online may be driven by a hidden motives which could "result in a shift in power structures between the academic and the university" (*ibid*:1). In particular, she suggests that putting their teaching materials on-line could "expose the staff member to assessment in ways that may not have been previously agreed to" and "reduce the ability of the staff member to argue for improvements in status, such as gaining tenure" (ibid:2). In addition, "Once the university has control of the courseware on the Web, then it can control who has access" to it (ibid:3), with the potential to restrict the content of a teacher's courses by withholding access to previously prepared materials. She also voices fears about the separation of course authoring and course delivery - for example, that 'deliverers' (teachers) will be paid less than authors, who will be dispensed with once the course material is written. In short, while being, she says, "an early and enthusiastic" adopter of eLT, she is wary of power shifts which could be caused by universities taking IPR of academics' course

materials. This is really just an extension, or even a re-articulation, of Noble's predictions (which have not yet come true) without his attendant drama. "Assessment in ways not previously agreed to" and "reduced ability to argue for improved status" have a slightly petty ring, when compared with "preserve their legal rights, their autonomy, their jobs and, above all, the quality and integrity of higher education" but in the end, it adds up to the same thing.

Barlow 1996 is concerned with the inadequacy of existing IPR legislation to cope with electronically-based materials and likens attempts to protect the trading of information via existing legislation to trying to protect wine sold in casks when only bottles are protected in law. He foresees a world where noone will claim to "own" information – but recognises that this owning currently has value (for example, to teachers) which will be lost to them if this ownership is lost. He suggests several solutions to this problem, such as teachers being paid for the *relationship* they have with, the *performances* they give for, or the services they provide to, their pupils, or possibly through encryption, so that access to information may be retained by some (e.g. teachers) when ownership is gone. All of these ideas imply an immense change may be in store for HE teachers, not only in their teaching methods but also in their role and sense of identity (another subject which came up in my discussions with my interviewees) and his proposed solutions look, to my mind, worse than the problems. I cannot imagine most teachers accepting a performer/councillor/ consultant role in place of their teacher-role, as currently defined, no matter how problematic that might become if they are no longer seen as owners of specialist knowledge.

In conclusion, then, the issues surrounding IPR in universities appear confused, despite many attempts by universities to clarify them ²⁴. There seems to be a general recognition that university teachers used to have general IPR over their teaching and research materials, if only through custom and usage but that the position may now be open to review or have actively changed. It is not, therefore, surprising that this subject emerged as one of the strongest themes from my interviews, as described in Chapter 7.

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²⁴ I tend to agree with Gladney that issues surrounding IPR have always been unclear, but that eLT has greatly exacerbated the situation.

3.5 Control (including issues of power and authority)

Much of what Manuel Castells has to say on the subject of power in Society in general and the changes on power relations which information technology is fostering there (see earlier in this chapter) would seem to have potential relevance to the 'sub-society' of UK Higher Education.

In a relatively early study on the effects on groups' and individuals' behaviour of communication via technology, as opposed to face to face, (Dubrovsky *et al* 1991), the authors conclude that the electronic media do *not* filter out social and personal factors when power in a group is being established, but these media do foreground such factors as knowledge and expertise. Although this study was specifically about electronically mediated communication and decision making, it still has a bearing on the way technology might affect the power and authority of teachers, who have more knowledge and expertise than their pupils and so should, on this reasoning, expect have their power *increased* (not decreased) when teaching via the web. This is interesting because the exact opposite was described by my interviewees; many said they felt their power had been *reduced* because of eLT (some minded, others said they did not) but none said it had increased. However, Dubrovsky's groups were of peers, rather than teacher and students, so perhaps the findings are not applicable to the latter relationships.

Mary Henkel addresses the subject of academics' power in a paper about the implications of quality assessment and assurance policies in higher education (Henkel 1997). She reports that opinions among her subjects are divided about whether university administrators' powers were being eroded by academics, or vice versa, but she does not investigate the matter further in that paper, nor draw any conclusions about whether the advent of eLT might be exacerbating the problem. Similarly, both Louise Morley and Carrie Paechter have also written (Morley 2001 & 2003 and Paechter *et al* 2001) about the links between power and quality assurance (Morley) and knowledge (Paechter) in HEIs, but the principal focus of both is on the effect on women's power and neither introduces the technological dimension of the problem.

Debbie Holley and Martin Oliver investigate "the changes in power relationships between managers, lecturers and students" brought about by a number of changes in HE, including the widespread introduction of eLT (Holley & Oliver 2000). They consider factors such as the rise of new managerialism in HE and the introduction of new student-centred pedagogies, compounded by the effect of introducing new technology into universities, which have led to an disenfranchising of university lecturers. increased They conclude that "traditional areas of authority have been taken away from the lecturer and given to other stakeholders" as a result of "new governmental priorities ... [and] student-centred pedagogy, compounded by the catalytic effect of new technology" (ibid:21). As a result, "the autonomy of the lecturer has been eroded ... posing a serious threat to the future of the profession [so that] the lecturing profession will inevitably find itself in crisis" (ibid:22). While they attribute some of this to other causes, such as governmental policies and "creeping managerialism", they see eLT as catalytic to all the causes, as well as a cause in its own right and fear the same broader consequences (a crisis in the teaching profession) as indeed I do myself.

Similarly, McKenna 2001 describes issues of reduced control and disempowerment among academics as a result of the introduction of computer assisted assessment. For example, she reports feelings among her study's participants that "some responsibilities in the assessment process were now shared with learning technologists and computer services staff who dictated, in part, issues of presentation, design and delivery" and that some academics resented this (*ibid*:13). She also reports concern among her subjects that the establishment of national subject banks, a development prompted by the increasing use of computer assisted assessment, might begin to determine university curricula, implying further disenfranchisement of their teachers. However, while she concludes that her study shows clear evidence of concern related to the actual and potential effect of eLT on teachers' sense of power and control, she points out that the study's limited scope means that the findings cannot be taken as representative of the teaching profession as a whole, and that relatively little had been published on this subject.

These two studies seem to have the most relevance to my own: both concern HE teachers' loss of power, autonomy or responsibility and lay the blame, at least in part, on the introduction of eLT. Each is based on a relatively small number of interviews (as is mine) – the result, perhaps, of the need to trade number against depth in qualitative interviews – and each has a slightly different focus, both from each other and from my own study.

Like Holley & Oliver, Rosemary Deem and Kevin Brehoney consider the advent of the 'new managerialism' (their quotation marks) in Higher Education and refer to its effect on power and dominance (Deem & Brehoney 2005). They describe characteristics of new managerialism as including "emphasising the primacy of management above all other activities, monitoring employee performance, and ... devising means of publicly auditing quality of service delivery", all of which are both likely to lead to a sense of loss of power by the academics and are considerably enabled by the introduction of eLT into universities. They suggest that some managers may "see new managerialism as representing their interests if they seek to use the ideological power and dominance it affords for their own purposes, including status and careers" (*ibid*:229) but they do not reflect on the role of eLT in enabling this power shift.

In a presentation given to a conference focussed on "Cyberspace Education" (Bayne 2002), Siân Bayne spoke about power relationships between teachers and students and how they are affected by, for example, the relative success of each in mastering the technology and the formation of the identity of each in cyberspace. An interesting conclusion she drew was that many of the students' concerns revolved around issues of identities and deceit (*ibid*: slides 13-17) whereas the teachers appeared to be more troubled by issues of power and control (*ibid*: slides 20-21). Where the latter theme is concerned, Bayne's teachers saw cyberspace as a place where traditional hierarchies can be reasserted and conventional authoritarian identities can be recast – a finding not supported by others, such as Dubrovsky *et al* 1991 and Holley & Oliver 2000, who found the opposite, that teachers felt disempowered, *vis a vis* their students, by the technology.

Note: Issues of power and control are related by some writers (Foucault 1977, Laurillard 2006) to issues of surveillance, especially with reference to Jeremy

Bentham's 'panopticon' prison design. The metaphor of the panopticon and its relevance to power and surveillance issues are discussed in the next section.

In summary, it appears that relatively little research has been undertaken on how eLT is affecting university teachers' sense of power and control, and that which has been done has generated a mixed (but not necessarily conflicting) set of conclusions, including Bayne's view that teachers may feel their status (vis a vis their students, at least) has been restored and others' suggestions that they may be losing a degree of control to, variously, their managers (Deem & Brehoney 2005) or administrators/technologists (McKenna 2001).

3.6 Privacy (including surveillance issues)

3.6.1 Introduction

As with literature on control/power/authority, I did not find a huge volume of published work on surveillance and privacy when I began my literature review. However, a little more has been published in the intervening years, perhaps reflecting a growing awareness of this potential problem for university teachers. Writers in this field referenced in this section and include Waldo *et al* 2007 for a broad overview of the field, Giddens 1991, Raab 2003 and Joinson 2005 & 2006 on privacy and Land & Bayne 2002, Dawson 2006, Kuehn 2008 and Goold & Neyland 2009 on surveillance. Others, particularly Bayne 2005 but also Flaherty 1997, Lyon 2006 and Luck 2010, are referenced in Chapter 8, where my interviewees' views on surveillance and privacy are discussed and in Chapter 9, where the linking-themes of trust and identity are introduced.

3.6.2 Privacy and e-learning technology

A study conducted under the aegis of the US National Research Council of the National Academies culminated with the publication of a very lengthy report (Waldo *et al* 2007) on the whole subject of privacy and eLT in the modern age which sets the scene for many of the other publications I reference on this topic. In their opening paragraphs, the authors point out that privacy has "many connotations", including, but not limited to, control over information, freedom from surveillance and the ability to keep electronic communications confidential. They also note that there are various "notions" of privacy,

including confidentiality of some specific information (such as which web sites a student or teacher may have accessed) and the right to anonymity in certain circumstances (such as when expressing views which may be critical of some aspect or member of the university). They identify a range of factors causing changes in modern Society's attitudes to privacy, of which they hold technological change to be one of the most significant, but emphasise that such attitudes are extremely context-dependent – that there is information which people might want to be kept private from one set of people, or in some circumstances, while they would be perfectly content for it to be shared with others, or in other circumstances. They also recognise that there may often be trade-off's between breaching privacy constraints (for example, to avoid 'inappropriate' web access or when dishonesty is suspected) and maintaining them (to allow enquiry into, for example, certain religions without the enquirer being branded as a terrorist). In short, they lay out the territory in terms of many of the issues which came up in my further reading, and my interview conversations, on privacy and surveillance associated with the use of eLT.

I found this a clear account of the law, custom and practice, and equally applicable to HE as to any other field they mention. However, it was of more use in defining the problems (the many facets of privacy, the need to balance security/crime prevention against individuals' privacy rights, and so on) than suggesting solutions and so had limited applicability to my research.

Turning to this more focussed topic, some interest has been shown in recent years on the subject of privacy and technologies such as the internet and eLT but the writers have often assumed that this is still a virtually unrecognised issue. Adam Joinson says "Few educators are aware of how online learning tools can betray the privacy of individual users and stifle their learning experience. ... Later this month, many thousands of students will ... log on to the ... VLE provided by their university and have their privacy considerably ... compromised. And no one will complain. Very few will even know" (Joinson, 2006). He goes on to say that "there is evidence to suggest that reducing students' privacy might lead to less successful educational outcomes". However, it is noticeable that once again, no mention is made of *teachers*' privacy, only that of students.

Other writers mention the problem in passing, such as Simpson & Perry 1999 who hint at threats to privacy caused by the web and web-based communication in a section where they are talking about copyright control issues. They say (*ibid*:15):

"As the Internet becomes available to almost everyone and Email becomes the preferred mode of communication, copyright concerns fade into the murky territory of privacy rights. Just as copyright control may be little more than a fantasy on the Internet, the privacy of a person's Email communications may be just as unlikely."

The subject of e-mail privacy was barely touched on in my interviews – only one teacher brought it up – but clearly e-mails are *not* confidential and many people continue to act as if they are. I expect this subject to become much more of an issue in the future; for now, it does not seem to be of concern to anyone in Higher Education.

There is a flip-side to the coin of technology-affected privacy, however. Several writers (Goold & Neyland 2009, Burkert 1994 and Raab 2003, for example) point out that technology can equally be used to *strengthen* privacy as to *invade* it; as ever, it is not the *technology* itself which is at fault, but rather the way it is used. Goold writes (*ibid*) of the role he expects privacy enhancing technologies to play once users have become sufficiently aware of their potential and the need for deploying them and Raab quotes Burkert and others (Raab 2003:6) as follows.

"A partial but ironic shift in the debate over the 'information age', in which technology was seen as part of the problem and not as part of the solution, can be seen in the current search for technological solutions for the problem of trust in electronic transactions (Burkert 1997; Phillips 1997). Whereas technophobia sustained criticism of state surveillance, new developments ... see them playing a large role in preventing invasions of privacy. ... If technology can preserve anonymity, it may have advantages in terms of sustaining a climate of trust for global information networks and electronic service delivery. Thus 'privacy-enhancing technologies' (PETs) aim to minimise or eliminate the collection of identifiable personal data and to replace 'tracking technologies' "

Unfortunately, it appears that the privacy-enhancing technologies referred to above have not yet emerged, at least in forms which would be helpful to meet the concerns included in this debate.

3.6.3 Surveillance

Surveillance has become so much part of modern-day life that some universities (such as London City University) now offer "Surveillance Studies" at Masters Degree level. The 'taster' for this course makes it clear that surveillance, knowledge, power and control (all of which are concerns of my own research) are closely interrelated when it says (Smith 2010):

"Surveillance has in recent times become a central concept in sociological understandings of contemporary social relations and organisational processes. Its operational reach, pervasiveness and effects surpass conventional psychological, spatial, temporal, social, cultural, economic and political divides. ... As such, surveillance is all about knowledge and power, identification and imposition, care and control, inclusion and exclusion". ...

The description which follows makes no suggestion that the course might cover surveillance (via the VLE or otherwise) of students and academics themselves, implying that this topic is still not prominent among academic concerns. A few writers at other universities are, however, beginning to address the topic. Dawson 2006, Kuehn 2008, Hoffman 2008 and Goold & Neyland 2009 are among those who express concern about the increased possibilities of surveillance the VLE provides and the effect this may have on students and teachers. Dawson 2006 highlights the way eLT has afforded surveillance of students by both HEI managers and teachers, and the way this can inhibit student behaviours, when he says:

"Coinciding with the implementation of [VLEs] has been the centralisation of data and the emergence of online activities that have afforded the capacity for more intimate modes of surveillance by both the institution and education practitioner. ... Both internal and external students surveyed indicated that their browsing behaviours, the range of topics discussed and the writing style of their contributions made to asynchronous discussion forums are influenced by the degree to which such activities are perceived to be surveyed by both the institution and teaching staff". (ibid:69)

Kuehn 2008, on the other hand, addresses the surveillance of HE teachers and its potential effects, claiming that even the possibility of surveillance could cause teachers to modify what and how they teach. He says:

'If the tool shapes the task, how does surveillance affect the teacher... and the process of teaching? The autonomy of the teacher has always rested with closing the classroom door. Whatever government policies or administrative directives were promulgated, the teacher could pay lip service to them, but then proceed to teach in a way that they thought best for their students. ... So what happens when the teacher in the classroom can have every action subject to external view?... This is the panopticon effect, as theorized by Foucault. By creating the possibility that an individual's behaviour is being monitored, the individual performs in ways that assume being watched, whether one is or not. The effect of information and communication technologies is to increase the potential of observation. ... [which] leaves an individual with no sense of what the limits to surveillance might be. Consequently, they act on the assumption that any surveillance is possible.

The stated aims of the introduction of technology to education ... are often framed in very positive terms like improved access, accountability and escaping the limits on education of time and space. However, the reality is often ... "potential individual and collective disempowerment ... where populations have high degrees of surveillance" (Dawson:81). That high degree of surveillance is increasingly a reality ... at all levels of education." (*ibid*:90-91)

I include this rather long quotation here because papers which raise the matter of surveillance of *teachers* are rather rare, but both Dawson and Kuehn do seem rather alarmist – the *existence* of technology to monitor teachers in this way, does not mean it will actually be *used* for such activities. However, as Land & Bayne point out (see below), teachers would perhaps do well to be aware of eLT's potential for monitoring, if only to discourage its use in this way.

Finally, a word about the panopticon. It appears to be very common²⁵ to compare Bentham's panopticon with modern surveillance tools and techniques, including those associated with eLT. Indeed, I found several writers who, like Kuehn 2008 refer to Bentham's and Foucault's ideas in this context. Land & Bayne 2002:4 say they agree that surveillance is not bad in itself, explaining that their approach is the same as Foucault's and illustrated by the quotation "My point is not that everything is bad, but that everything is dangerous ... So my position leads ... to a hyper- and pessimistic activism (Foucault 1977:231-2)". However, they go on to focus exclusively on the dangerous side. For example when they, like Foucault, link issues of surveillance and power, they say "We have to bear in mind that in the everyday functioning of the virtual learning environment, the tutor ... has access to extensive surveillance tools and the student does not. ... how comfortable should we be ... with such ready,

Chapter 3: The Literature

²⁵Land & Bayne (2002:4) say "It is not surprising that those theorising the place of privacy in the information society have seized upon Foucault's analysis and the panopticon metaphor" and cite 7 examples.

casual access to tools which so starkly represent 'power of mind over mind?" (*ibid* p.5-6) Although Phillips & Geroimenko 2004 view the panopticon more favourably ("the focus on the negative interpretation of the Panopticon does not do justice to the utilitarian and humanist ambitions of its creator" (*ibid*:2)) and use its design as the basis of their own eLT, Land & Bayne's caution is more typical of the literature I found on the subject.

In short, the published work I found on surveillance/privacy and eLT dealt mainly with concerns over the privacy of emails and the rights and wrongs of using VLE surveillance facilities. The writers were generally concerned about the ethicality of the latter but few had much thought for its potential effect on university teachers.

3.7 Trust and identity

The two themes which I suggest might link the concerns which emerged from my analysis are issues of trust and the academic's role or sense of identity. A number of researchers have addressed one or both of these issues, including Dreyfus 2001, O'Neill 2002, Raab 2003, Elton 2004, Panteli 2005, Riegelsberger *et al* 2005 and Bayne 2006 (on trust) and Collins & Berge 1996, Dreyfus 1996, Turkle 1987, 1996, & 2005, Bayne & Land 2000, Henkel 2001, 2004 & 2005, Bayne 2005, Pelletier 2005, Day *et al* 2006, Sikes 2006 and Jawitz 2009 (on role/identity). This section summarises the prevailing views of these writers while Chapter 9 addresses how far my research findings agree with, or take forward, the views of these and similar researchers in the field.

3.7.1 Trust

The subject of *trust* recurs throughout the literature on power/control, knowledge ownership and surveillance so I decided to explore, as a subject in its own right, its associations with higher education and the introduction of eLT.

Charles Raab sets the scene when he opens his paper with "The application of information and communications technologies ... to the provision of goods and services ... requires trust and has implications for the way trust is understood and managed" (Raab 2003). He is speaking broadly here but does not exclude HE teaching from his "goods and services" and later talks about

issues of trust with regard to information flows, privacy, surveillance and privacy-enhancing technologies, all of which are issues in Higher Education, as mentioned earlier in this chapter.

In her Reith lectures on *Trust* (O'Neill 2002), Onora O'Neill talks in Lecture 1 about the need to be able to trust the integrity of academics as well as students. She says (*ibid* 1:2): "Huge efforts go into ensuring trustworthy performance. ... Examiners control and mark examinees (but are *they* trustworthy?)" and points to a potential cause of mistrust as "the new ideal of the information age: transparency, which has marginalised the more basic and important obligation not to deceive" (*ibid* L1:5). In Lecture 4, she considers how we trust information, asking "How can we tell which ... supposed facts are trustworthy when so much information swirls around us?" (*ibid* L4:1). I take her remarks to imply that the 'transparency' offered by eLT – free and easy access to *all* information – may in fact be rather less valuable to the student than the teacher's offering of a selected and interpreted (therefore clearer and more reliable) 'truth'.

Lewis Elton talks about a loss of trust in HE teachers' professional abilities when he says: "There was a time ... when academics were trusted to do a professional job. Not any more; today trust has been replaced by accountability" (Elton 2004:1). He goes on to suggest various causes for this, such as the possibility that it was always misplaced, that Quality Assurance has become the mantra of the age and thus the death of trust or that new HE governance structures, at all levels, are stifling trust. However, he makes no mention of any of the themes identified in my own research so I take his paper as some corroboration of my idea that trust has been eroded but neither confirmation nor rebuttal of the idea that eLT may be a contributory factor.

An obvious aspect of trust is the general feeling off mistrust of a disembodied presence which people often experience. Niki Panteli talks (Panteli 2005:1) of the need for trust in teams of people working together in a virtual environment²⁶ and quotes Handy 1995 as follows: "Virtuality requires trust to make it work: technology is not enough". Later, she claims that there is a link

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²⁶ Which could be, for example, teachers and students working together in a VLE.

between trust and power issues (as I do in Chapter 9) concluding that "the fragile sphere of virtual relationships requires a much higher level of trust than do hierarchically controlled settings" (*ibid*:4) and arguing the importance of building trust, for example through minimising power imbalances.

Hubert Dreyfus also refers to the problem of disembodiment when he says:

"I have to be in the same room as someone and know they could physically hurt me or publically humiliate me and observe that they do not do so, in order to feel that I can trust them ... There is no doubt that telepresence can provide some sense of trust but it seems to be a much attenuated sense (70-71)". (Quoted by Nicholas Burbules' in his critique (Bubules, 2002) of Dreyfus 2001)

This would seem to have serious implications for those teaching and learning by means of eLT; if it is impossible to establish trust without face to face interaction, how are students to trust what they are being taught and how will teachers be able to trust the work which their students submit to them?

This issue is also addressed by Riegelsberger, Sasse & McCarthy 2005 in their investigation of "mediated interactions" which take place on-line rather than face to face, and find trust to be an important issue there. The "mediated interactions" to which they refer are broad-based - call centre interactions, ecommerce and on-line gaming, for example – but their arguments could apply equally to eLT-enabled encounters such as web-based lectures and seminars. They say "designing for trust in mediated interactions has become a key concern for researchers in human computer interaction (HCI). While much of this research focuses on increasing users' trust, we present a framework that shifts the perspective towards factors that support trustworthy behaviour." (ibid:381). They claim that these transactions - such as computer-mediated teaching - can only be successful if all involved trust each other, the systems they are using, and the organisations which provide and support them. The implication is that, without trust, e-teaching/e-learning will not be successful. They also suggest that it would be more successful to design systems and processes that encourage trustworthy behaviour, rather than try to invent technologies to increase trust. An example, in HE, might be to stop trying so hard to perfect plagiarism-detection software and instead design assessment processes which do not give students and academics the need to plagiarise.

O'Neill asks how we know which information can be trusted when so much is available via the Web. A particular facet of this is the question of whether teachers' publications are to be trusted if they are not paper-based. This debate has been fuelled by the fact that research published electronically appears to carry less authority than paper-based publications, as evidenced for example by the way it rarely counts towards a university's Research Assessment Exercise (RAE) rating. Siân Bayne 2006 takes a literacies approach to the issue of attitudes to e-publication, looking at some words learners and teachers use when talking about issues of authority, legitimacy and trust in relation to electronic-based text. Bayne explains that electronic publishing involves "an increased separation between the figure of the author and the text" (*ibid*:18) and quotes Mark Poster as follows:

"Because digital writing may be rewritten with ease, the stability of words on paper is lost, severing the link between author and the text that was established with so much difficulty during the first centuries of print" (Poster 2001a:97).

She points out the implications of this distancing on a community which places huge emphasis on knowing *exactly* who has written anything; the result, she says, is "a general distrust of the veracity of text on the internet" (*ibid*:20). It is easy to imagine the feelings of academics whose work has been published electronically and is then mistrusted, or at least undervalued, as a result.

In summary, I found a number of issues concerned with trust, or lack of it, in relation to HE and communications and information technology. The general problem of building trust without embodiment (Handy 1995, Dreyfus 1996, Raab 2003, Riegelsberger *et al* 2005), questions about trusting teachers' professionalism (Elton 2004) and integrity (O'Neill 2002) and issues over which information can be trusted (Poster 2001, O'Neill 2002) with references to information flows, power, control and privacy in most of these discussions. I return to the linkage between all these themes, in the light of my own research findings, in Chapter 9 of this thesis.

3.7.2 Sense of identity

Turning to the matter of teachers' sense of identity, including their perceived role in HE, I was pleased to find a large number of books and research papers

on this subject (unlike several of my previous topics, where the available literature was sparse). Christopher Day *et al* 2006:10 set the scene when they say "If identity is a key influencing factor on teachers' sense of purpose, self-efficacy, motivation, commitment, job satisfaction and effectiveness, then investigation of those factors which influence, positively and negatively, the contexts in which these occur and the consequences for practice, is essential" Their argument is that every teacher has two types of 'self' (sense of identity): a "socially constructed, and therefore contingent and ever-remade, 'self' and a 'self' with dispositions, attitudes and behavioural responses which are durable and relatively stable" but that "teacher identities may be more, or less, stable and more, or less fragmented at different times ... according to a number of life, career and situational factors". The implication is that a significant "situational factor", such as the introduction of eLT, could profoundly affect teachers' "unstable" sense of identity and hence their sense of purpose, self efficacy, etc and, ultimately, impact their practice.²⁷

A number of writers (for example, Henkel 2000 & 2004, Sikes 2005 & 2006 and Jawitz 2009) focus on the disruption to academics' role and sense of identity caused by a variety of different factors. Jeff Jawitz's work concerns the "formation of academic identities ... where the nature of academic work is contested ... as a result of tensions within the discipline and in response to pressure from the institution and the field of higher education", and he identifies "a complex relationship between identity construction and participation within the particular configuration of teaching, professional and research communities" (ibid:241). Mary Henkel deals with similar concerns. In Henkel 2000, she looks at the classical notion of academic identity (a set of strong individuals within a community of equals), considers how far this is reflected in reality, and suggests that HE reforms have created a new environment (foregrounding the institution over the disciplines) which may adversely affect academics' sense of identity. In Henkel 2004:167, she suggests that "the traditional strength and stability of academic identities are strongly associated with communities, primarily the discipline and the university"; she "examines the implications for academic professional

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²⁷ This study is based on school teachers but could equally well apply to HE teachers.

identities"; and she argues that the right policies could help members build "a strong epistemic identity in the context of change". Likewise, Pat Sikes' two papers on HE teachers' roles and sense of identity (*ibid*) conclude that profound changes in the HE environment – in this case caused by the HEI becoming a university and subsequent pressures for it to become a research university – can generate huge tension and confusion in teachers whose roles have changed and who are unclear about, or unhappy with, these changes.

I found all these papers had resonance with my own investigation. I too fear that external tensions and pressures may be affecting academics' sense of identity, although in my case the underlying cause may be increased use of eLT in HE teaching, rather than Jawitz's conflicts between research, teaching and professional practice, Henkel's HE reforms or Sikes' change from a polytechnic to a university and RAE pressures. As argued by Day *et al* 2006, if eLT is causing, or at least contributing to, an unease over role and identity, the consequences can be harmful and far reaching.

Some authors (Gunawardena 1992, Du Preez 1999, Bayne & Land 2002, Usher & Edwards 2000 and Rhem 2001, for example) directly attribute the changing role of the HEI teacher to the introduction of eLT. Usher & Edwards talk of the Internet being "a social space which ... helps in restructuring and foregoing creolised identities" because "in the virtual classroom, the focus moves away from the teacher as a central authority" which "involves a redefinition of the role of teachers" (ibid:3-4). Similarly, Du Preez says "Where the relation [between teachers and learners] was usually described by a hierarchical top-down approach, ... these relations are now overturned by the Internet" (Du Preez 1999:7) and Bayne & Land write "the new educational media are enabling new forms of academic discourse to emerge [which] have the potential to fundamentally alter the roles of instructor and learner" (Bayne & Land 2000:100). Gunawardena says "In order to change to a learnercontrolled instructional system ... I had to change my role from that of a teacher at the front of the classroom and the centre of the process to that of a facilitator who is one with the participants and whose primary role is to guide and support the learning process" (Gunawardena 1992:61, quoted in Collins & Berge 1996:6) and Rhem, when discussing Collison et al 2000 (a book on online teaching) says "An online teacher ... was more like a guide on the side instead of a sage on the stage" (Rhem, 2001:1).

Siân Bayne 2002 and Sherry Turkle 2005 see eLT as a place where teachers (*inter alia*) can and do deliberately create new identities for themselves. Bayne says "In [this teacher's] account of the identity he constructed ... the image, for me, is almost of the formal teacherly identity being strapped on like a suit of armour" (*ibid*: 12) and she goes on to give further examples of the same effect. Clearly, the eLT has actually *empowered* these teachers here, rather than the opposite, as it is claimed to do in other circumstances, by affording them a temporary change of identity to a sterner/more accomplished/more controlling person. Turkle goes further; she claims that adopting many different identities, for example in role playing games, can help people discover a new (postmodern or privileged) way of learning and knowing. For Bayne and Turkle, then, identity fluidity is a good thing, offering empowerment, new ways of learning and teaching and new freedoms.

3.8 New times, new ideas?

Most of the publications discussed so far have been based on work which predated my analysis phase. Because much has changed in the intervening years – especially in the hectic world of eLT and even in the more stately world of HE – I made a final literature search, when I had almost finished writing this thesis, to see whether any recent publications had reached conclusions which might confirm or contradict my own findings. This section summarises the result of this search.

• Universities – their management and role in society

Most recent publications about Higher Education focus on new visions for universities, including better ways of organizing them (Barnett 2005), managing them (Deem & Brehoney 2005, Deem & Hillyard 2007), broadening their reach (Taylor 2005, Gourley 2010) and making what they teach more useful (Star & Hammer 2008). All refer to the use of eLT (indeed, it would be strange to consider new visions for universities these days without talking it into account) but not in any way that would contradict my research findings. The discussions of new management structures (Deem *et al* 2005 & 2007) are

relevant to my work only in so far as such changes may add to the feelings of disempowerment, loss of trust, stability or clarity in teachers' roles which my research has shown as already present following the introduction of eLT into teachers' working practices.

One publication which does seem relevant is Grainne Conole's "Managing differences in stakeholder relationships and organisational cultures in elearning development" (Conole 2006). Here, Conole looks at the reasons for the demise of the UK's e-university (UKeU) only five years after it had been launched in a fanfare of publicity, and concludes that the prime cause was a huge difference in expectations between UKeU's various stakeholders. Some were well satisfied with the direction and progress of the development effort but others were not and eventually the whole enterprise collapsed. Bearing in mind that my starting point for this research was the importance of satisfying all HE stakeholders, I take Conole's paper as an example of what can happen if one fails to do so.

• ELT and teachers' response to it

A fair amount of research has been published in the last five years on eLT (probably because it changes so rapidly that there is always something to say about it) but only a relatively small amount concerns teacher' responses. Maguire 2005 is one of these exceptions: in a study reminiscent of many published around the time I started my research, she reviews literature from the last two decades on the barriers and motivators to teachers participating in distance education (which, of course, relies heavily on eLT) but she does not touch on any of the themes with which my thesis is concerned.

Once again, many publications focus on how eLT can best be used to improve *student* learning. For example, Clegg *et al* 2005 describe how electronic progress files will encourage students to reflect on their learning and so help them to learn better, and Laurillard 2006 argues that eLT should be driven entirely by an understanding of learner needs, and not just replicate old teaching methods. She goes further to suggest (Laurillard 2008) that it is the HE teachers' job to work out how to do this and that they should all become action researchers to meet this responsibility. Goodfellow & Lea 2007, by

contrast, offer a radical challenge to conventional ways of approaching elearning, suggesting that, rather than focusing on the technology or the learner, we should adopt a *literacies* approach, focused on the texts and practices involved in e-learning, if we are to realise the true potential of eLT. This whole critique reinforces my argument (see Chapter 9) that we must approach eLT implementation and use from a *multi-faceted* perspective which takes account of feelings and language as well as technical factors.

The publication I found of most relevance was John O'Donoghue 2006's "Technology Supported Learning and Teaching: A Staff Perspective" which is the first book I have read which focuses entirely on teachers' responses to eLT. As it happens, I had myself written a chapter for this book, and had it accepted, but it was later edited out and I subsequently lost track of the work. O'Donoghue's central question is: why is eLT-based teaching often so similar to the old pedagogies and what can be done about it? He concludes that the main barriers to change are issues related to the "culture, nature, motivation and resistance to change within institutions, establishments, infrastructure and the staff within them" (*ibid*: viii) and the rest of the book is devoted to this topic. He himself says many things which chime with my own findings: for example (*ibid*: vii) "Academics in the main are not anti-technology" (as I found with my own interviewees) and, in his introduction to Moron-Garcia's chapter, "This... contributes to an under-researched area by reporting the subjective views of academics who have adopted ICT to support their teaching".

Moron-Garcia's chapter itself, which reports academics' responses to their VLE use, is very helpful in that it complements, rather than contradicts or replicates, my findings. She focuses on more practical issues such as the training her interviewees had received, the changes in their workload and the different pedagogies the eLT allowed or forced them to adopt. Her methods are similar to my own, as are her findings – that the picture is confused, staff like some things but not others, and the younger staff are more enthusiastic that the older ones (something I did not examine closely). I was glad to find a similar study: each such investigation adds clarity to the whole picture.

Knowledge ownership, IPR and plagiarism

A great deal has been published in the last five years on these topics but almost all of it (Joycoy & DiBiase 2006, Krsak 2007, Carroll 2007, Boyer 2010) is concerned with ways of detecting and preventing *student* plagiarism. A few writers (Donnelly *et al* 2006 and Lowe 2006 for example) address the reasons why detection software may be undesirable (it creates a climate of mistrust, is unethical, inhibits students' writing and so on) and a few take a more strategic view (McGowan 2005, Flint *et al* 2006; and Sutherland-Smith & Pecorari 2010), suggesting other approaches to the problem which may be more practical or ethical. None of these writers, however, is concerned with academics and plagiarism except Flint *et al* 2006 who report on the differences in attitudes of staff and students to the issue (see Section 3.4.2).

An interesting publication was Reid 2008 which is essentially a handbook for eLT-using researchers to guide them round the legal and practical aspects of IPR, so they can avoid accidentally plagiarising other academics' work. If some of my interviewees had had such a guide, they may not have been quite so anxious about the area.

Privacy

A point of interest in this area is that some recent researchers (Luck²⁸ 2010, for example) have become conscious of the downside of using surveillance tools (unethical, causes mistrust, causes students to adopt sub-optimal learning strategies) and others (for example, Lyon 2006) are exploring the theory behind it. The most pertinent publication for me is Whitty & Joinson 2008 because it approaches the matter in a multi-perspective fashion, including issues of surveillance, deceit, on-line identity, trust and ethics all together, which is similar to my own approach.

Both Ray Land and Chris Jones have recently published work on embodiment and secrecy/deceit in on-line identities (Land 2005 and Jones 2005) but the former focuses entirely on *students*' feelings. Jones, however, considers the 'unknowability' of internet audiences and suggests that teachers have lost control over how their students learn in a virtual learning environment.

Chapter 3: The Literature

Luck is not actually concerned with surveillance in HE, but his theories could equally well apply there.

• Sense of identity

I found more new published work in this area than any other, which leads me to suspect that this is a matter which is particularly troubling academics. There is a general agreement that HE teachers are suffering from a loss/confusion about sense of academic identity, but less agreement over the cause. Some suggest the general upheavals in HE are a prime cause (Chowaniec 2005, Clegg 2005, Harris 2005, Kelchtermans 2005 and Sikes 2005 & 2006) whereas others feel that technology may be a culprit (Pelletier 2005, Unwin 2007). The approach I find most relevant to my research is that of Beck & Young 2005 because, once again, they take a plural perspective of the issue, considering sense of identity, knowledge and power all to be interlinked.

Summary

A considerable body of work has been published in the last five years on topics directly or peripherally related to my research – the above are just a few examples – but none of it contradicts or otherwise affects my findings. The most interesting aspect is that some writers are adopting a multi-faceted approach, similar to my own, which takes into account some or all of knowledge, power, trust, sense of identity and privacy when trying to understand attitudes and events in higher education.

3.9 Reflections

I draw several conclusions from the picture painted by these researchers, both relating to the subject matter and the methodologies appropriate to exploring it. Firstly, regarding scope and methodologies, I note that, while the research interest relating to the effect of educational technology on HE stakeholders used to be focussed almost exclusively on the response of *students* to technology assisted teaching and learning, there is now some research interest, at least in this area, in the responses of university *teachers* to this development. In addition, while much of the older work is American, or occasionally Australian, there is now some considerable interest in the subject in the UK.

Furthermore, I note there has been an increase in qualitative studies, often involving small numbers of respondents, interviewed in some depth, rather than the large questionnaire-based studies which were common towards the end of the 20th century, and that a few researchers are beginning to take a multi-faceted approach to studying reactions to technology.

I take these trends to imply that other researchers, apart from myself, have felt that this has been an under-researched area and that multi-faceted qualitative methods are more appropriate than single-focus quantitative studies when feelings are being investigated.

My summary of the findings and deductions from the research papers and the opinions expressed in the publications discussed in this chapter are broadly as follows. First, it would appear that most UK-based writers and researchers believe that information technology *is* having a significant effect on UK universities as a whole, and will continue to do so. In addition, some are starting to predict that it will have an effect on HE teachers too but there appears to be no clear consensus as to the precise nature and extent of this effect. In particular, with regard to the themes which emerge from my interviews, there has been some discussion of teachers' responses to issues of plagiarism and IPR, rather less concerning control and status, and only a very small amount about privacy and surveillance issues which are being, or might be, experienced by university teachers. There is also some interest in issues of trust, in relation to university teaching as well as more generally, and considerable interest in university teachers' sense of identity and changing role in the eLT-enabled HE environment.

In the early literature, those who did recognise that some teachers may have concerns about the ever-increasing use of educational technology in their teaching and other professional practices (for example, Dearing 1997) appeared to the focus mainly on practical matters, such as better training in the use of the new tools, staff reorganisations to include the hiring of 'course development experts', or the development of plagiarism-detection software and better guidelines regarding intellectual property rights. More recent literature seems to have moved away from such approaches and is more

concerned with understanding teachers' feelings and modifying the technology to solve problems, rather than create them (Burkert 1994, Raab 2003).

Finally, I infer from this body of literature that, while there does not yet seem to be sufficient knowledge about how these changes in university teaching methods might affect its teachers, there appears to be even less awareness of, or at least reflection on, how the universities as a whole, and hence the society we live in, may be affected as a consequence. This would appear to be a very important matter, which is being largely ignored by all who could usefully contribute to the debate.

In summary, it appears that teachers' responses to the introduction of these digital technologies has been until recently a significantly under-researched topic and that even now, although a fair number of people are writing about the effect educational technology is having, or is expected to have, on Higher Education teachers, their views are often contradictory – beneficial effect / harmful effect / little or no effect; evolutionary or revolutionary; important or irrelevant; and so on – so that further research in this area is both necessary and desirable.

Another way of looking at the research process which appeals to me (apart from Kvale's 'traveller' analogy described in the next chapter) is that of an incomplete impressionist painting. The picture is made up of millions of dots, but some are still missing. My aim is to contribute more dots – perhaps only one more dot – to make the picture clearer. This chapter has described the picture as it is without my contribution, and tried to identify where it is still incomplete; the rest of this thesis will describe my dot and the clearer picture with it in place.

4 Methodology and Methods

This chapter describes and discusses the overall methodology which I used in my research and the methods, tools and techniques I employed within this methodology. It covers the rationale which lay behind my choice of methodology and methods and reflects upon its strengths and drawbacks, the implications of these on my findings, and the lessons which I derived from using this approach and these methods. In keeping with the spirit of the methodology (that the overall objective should be to relate interesting stories from the researcher's 'travels'), the discussion is also illustrated with some examples and anecdotes from my period of research.

4.1 Methodology:

4.1.1 Overall approach

My choice of methodology was (rather appropriately) arrived at very gradually, in the course of what I came to see as my initial preparations for my journey of discovery. The methodology I adopted is based on Steinar Kvale's²⁹ metaphor (p4) of the researcher as a "traveler on a journey that leads to a tale to be told upon returning home". Kvale explains that, in his view, there are two ways of looking at the researcher, either as a miner or as a traveller. In the first metaphor, researchers may be seen as a miners who dig diligently, here and there, near and far, at depths both deep and shallow, using simple or complex tools, until they find a nugget of precious gold, or a valuable jewel, which they can show, triumphantly, to their friends as being the marvellous results of their labours. In the second metaphor, researchers are instead travellers, wandering through a strange and foreign country, seeking understanding of that country, or perhaps simply wanting to experience it, and describing their travels, their experiences, their impressions, to their friends on their return home. When describing this second metaphor, Kvale says:

The interviewer/traveler wanders through the landscape and enters into conversations with the people encountered. The traveler explores the many domains of the country, as unknown territory or with maps, roaming freely around the territory. The traveler may also deliberately seek specific

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²⁹ All page references to Kvale are from Kvale 1996.

sites or topics by following a method, with the original Greek meaning of 'a route that leads to a goal'. The interviewer wanders along with the local inhabitants, asks questions that lead the subjects to tell their own stories of their lived world, and converses with them in the original Latin meaning of conversation as 'wandering together with'. (p4)

This one brief paragraph appeared to me, when I first read it, to encapsulate exactly what I might attempt to do and how I might go about it. The objective was not – could not be – a single shining gem of truth, a hard impregnable fact which could be displayed and admired by all. These were *feelings* that I was trying to find out about, complicated, wide-ranging, inscrutable, interpretable feelings, and, worse still, I would only be able to talk about be *my impression* of those feelings – the results would be coloured by my perception, as well as by the teachers' attempts at expressing their feelings. The output from this research would not, then, be a gem, but rather a traveller's tale.

There was more. I would indeed "wander" through the landscape (of eLT use in Higher Education) and "encounter" inhabitants of that landscape (users of this technology). Some would volunteer to talk to me, others I would seek out. I would not try to get a "representative sample" of the country's population – as well to wander through China and try to find a "representative sample" of Chinese people to talk to. Rather, I would think carefully about every person I encountered and every conversation we held, and expect to find interest in all. Also, as Kvale described, I would follow some maps (papers and texts written by others on the subject), but not too rigidly, lest I overlook a small field or path which has not so far been well explored (or even found at all) by others; I might seek out some sites (topics) of special interest described by others; and use recommended routes (methods) to help me towards my goal. I would hold conversations (rather than structured interviews) in the manner of "walking together" with the people I would meet in this exciting new country of eLT use, and, finally, I would reflect upon my experiences and tell my tales when I came home. These would be only be stories and impressions, it is true, but hopefully they would be interesting stories and insightful impressions which would cast some light for others on the country and its inhabitants, and cause them to want to explore the country too.

So, in one vivid paragraph, Kvale described for me a way of approaching – and then conducting – my research which seemed to me appropriate for what I was trying to do. Of course, I did not have a complete awareness, at the start, of just how appropriate this methodology would be for my purposes, but as I made my journeys, held my conversations, reflected on what I had heard and on my impressions, and tried to tell my tales, I found much more about how helpful, how appropriate, this approach was – and also, in some cases, how there were potential disadvantages, too, in adopting this methodology³⁰.

4.1.2 InterViews

Another key aspect of my methodology for which I am deeply indebted to Kvale is my approach to interviewing. Kvale describes (for example, on page 15) his concept of "InterViews" which are *exchanges* of views and the joint construction of knowledge *between* the two views, rather than events built around uni-direction questions and opposite-direction answers. That is, his InterViews were not interrogations, they were two-way conversations, where the interviewer was not only *allowed* to comment, but was actually *expected* to do so, in order to better promote a common understanding of the subject matter being explored. In such InterViews, the human interaction, the conduct of the interview and the words of the interviewer, all had relevance, as well as the words of the interviewee.

This approach to interviewing was entirely consistent with Kvale's traveller-researcher metaphor. A traveller who falls into conversation with (walks with) those he or she meets is unlikely to expect these people to answer a set of pre-structured questions, both because they would probably not wish to be interrogated – they might even take offence, or at least terminate the conversation as soon as it was polite to do so – and also because the wanderer would be unlikely to build up a very rich picture of the inhabitants by means of such an approach. In keeping with this approach, therefore, I chose to use *unstructured* interviews, rather than structured ones, as being more consistent with the overall methodology and potentially more likely to elicit deep feelings than a more structured question and answer session might do.

³⁰ Note: I relate more about the advantages and disadvantages of my approach in *Reflections* at the end of this chapter.

Once again, this choice had its advantages and disadvantages, its features and perils. For example, I became aware, during my reflections on the methodology and methods I was using, that my own attitudes and preconceptions and the attitudes and perceptions of my conversationalists about and towards me all had the potential, at least, to affect what was said in the conversations. This and other reflections on the interviewing methods I used are also discussed further in *Reflections* below.

4.1.3 Postcards and a journal

My methodology included a small extension of Kvale's metaphor, to cover my reporting along the way. This traveller would – and did – send back 'postcards' from time to time, to reassure those at home that the journey was going well, to assist me in my thinking and learning process which was planned as, and indeed became, an integral part of my travelling, and to capture impressions and experiences as my journey went along, as I did not trust my memory well enough to let me report only when the journey was finally completed. In addition, a travel journal would be kept, recording events – and sometimes reflections – as they happened, mainly as an aide-memoir but also as a element of proof, if one were ever needed, that the journey related in the final traveller's tale had actually taken place.

In accordance with this idea, I wrote regular reports, on a great range of subjects³¹, throughout my travels. These were still, essentially, traveller's tales, but of a different type than those that would be told when the journey was finally over. Some dealt with incidents that had just happened, some with reflections on questions that had recently arisen from my observations or conversations, but all were time-based – each dealt only with an event, or a way of thinking, that was current at the time of writing. Some of the early ones seem to me to be hopelessly naive or just plain wrong when read now, but they were a product of how much – or rather how little – I knew when I wrote them. If they are re-read in sequence, it is possible to follow the chain of events, of increasing knowledge and understanding which they reveal. The final traveller's tale (this thesis) is structured in a different way, with records of

³¹ Examples of these are given in Chapter 5, Box 5-3.

Chapter 4: Methodology and Methods

early events benefiting from knowledge of later ones and of insights that had not been gained at the time of the event concerned. The traveller's final tale has been *informed* by the postcards but not limited by them and what exactly they had said, which may have been appropriate only in the context and timeframe within which it was originally written.

These 'postcards home' are somewhat similar to, but encompass more than, the 'memos and notes' recommended by Strauss and Corbin (1990:197). Strauss and Corbin's memos and notes are essentially tools to assist the analysis process and some of my postcards did indeed have a similar function. Others, however, reported progress – where I was, what I had seen recently, what I was thinking about at the time. The postcards differed from the travel journal – that is, the research diary which PhD students are required to keep during their time at university – in that they were intended to be read by others (and were even responded to, in the case of 'postcards' to my research Supervisor) whereas the diary was not ³². Again, the usefulness of, and problems with, these devices are discussed further in *Reflections* below.

4.1.4 Analysis

In line with Kvale's recommendations(p81), my investigation proceeded through seven stages: thematising, designing, interviewing, transcribing, analysing, verifying and reporting. What actually happened at each of these stages is described in Chapter 5; at this point it is necessary only to record that Kvale's methodology and recommended procedures were found to be very appropriate, and were used throughout, but that my analysis phase also benefited from help from elsewhere. This is not inconsistent: Kvale describes five approaches to analysis (while not claiming this to be an exhaustive list), one of which he calls "ad hoc methods³³" (p 191). He says:

The most frequent form of interview analysis is probably an *ad hoc* use of different approaches and techniques for meaning generation ... [where] no standard method is used for analysing the whole of the interview material. There is instead free interplay of techniques during the analysis. Thus, the researcher may read the interviews through and get an overall impression,

³² Unless the diary may be required to function in the 'audit trail' recommended by, for example, Smith 1996:269 in his section on judging the validity of research based on grounded theory.

³³ Not implying that such methods are in any way casual or shoddy, but rather that one should best-fit the analysis method to the need at the time.

then go back to specific passages, perhaps make some quantifications like counting statements indicating different attitudes to a phenomenon, make deeper interpretations of specific statements, cast parts of the interview into a narrative, work out metaphors to capture the material, attempt a visualization of the findings in flow diagrams, and so on. Such tactics of meaning generation may... bring out connections and structures significant to the research project. (pp203-4).

This was in fact the approach I adopted and I am indebted for guidance on analysis techniques to a number of writers including Miller 1982, Manning 1982, Miles & Huberman 1994, Helman 1996, Strauss & Corbin 1990, Symon & Cassell 1998 and Richardson 2000.

My debt to Strauss & Corbin needs some explanation in the light of the discussion below contrasting Kvale's approach with grounded theory. Although I did not follow a true grounded theory methodology, I did find some of Strauss & Corbin's ideas useful when conducting my analysis. My use of these techniques is discussed further under "Analysis – general" below and in Chapter 5, *The Journey*.

4.1.5 Why not use grounded theory?

As will have become clear from the foregoing paragraphs, I did not adopt grounded theory as my chosen methodology. Since this has been, for some years, generally held to be the most useful methodology for qualitative research, particularly in fields such as education (Thomas & James 2006:766), I feel I should explain this choice.

My first problem with grounded theory concerned the type of results I was likely to obtain from my research. The focus of my research was teachers' feelings: feelings which were not even fully understood by those who were experiencing them, as soon became clear, during my interviews, both from individual remarks made by the interviewees (see Box 8-1, for example) and also from the contradictions and inconsistencies in what people said about their feelings (for example, see Section 7.6). Thomas & James distinguish (ibid: 772) between two uses of the word "theory": they claim that it can mean either (a) a tool for thinking or a loose conjecture (as in "I have a theory why my geraniums are dying") or (b) a set of statements telling us something about the world which can be proved or disproved by empirical investigation. It quickly

became evident that what would emerge from my analysis was more likely to be a 'type (a)' theory – perhaps only an aid to thinking about teachers' feelings, but at best just a far-from-tight conjecture about what teachers might be feeling and why. It was unlikely to be a 'type (b)' theory – a set of provable statements about teachers' reactions to the technology and what had caused these reactions. It seemed far from impossible that I may not end up with a *theory* at all (in the sense that theories concern universals ("all or most teachers feel such and such") but would have to settle for a *description* ("the teachers I spoke to felt this and this") and grounded theory seemed better designed for theories than for descriptions.

My second concern was with the idea of language acting as a *barrier* to understanding – that it has to be "fractured" (Strauss 1987) to allow meanings to escape thereby "freeing the researcher from description and forcing interpretation to higher levels of abstraction" (*ibid*, p55). My position was more like that of Thomas & James' researchers: I was first and foremost a listener, with language as my prime conduit of meaning, and far from wishing to be "freed from description", I fully intended to describe, as accurately as possible, what I heard.

Thirdly, I thought the ephemeral nature of my research focus (feelings) made it possible that I may not "discover" anything – a nugget of truth, a robust theory or anything similarly tangible – but rather I expected to observe, then describe, and then hopefully *construct*, or at least suggest, insights and meanings from my observations. This expectation did not seem compatible with the aims, and the methods, of grounded theory, and the recommended techniques seemed inappropriate to my needs.

In fact, therein lay the crux of my discomfort with grounded theory. Unlike Thomas & James, I did not have any particular quarrel with the approach as a whole, I just felt that it was not well suited to my own particular investigation. Its methods seemed rather too stringent, too powerful, too rigid for the fragile, elusive feelings which I was trying to study. I therefore looked at how Kvale's approach might overcome these concerns.

Regarding <u>discovery</u>, Kvale makes clear right from the start that his traveller will not *discover* anything (this he saw as the role of the miner, the scientific researcher), that he or she will instead observe, describe and construct "meaningful and creative interpretations" (p.174). He talks of the qualitative interview as being "a construction site of knowledge" (p.42) and "the potentialities of meanings in the original stories" being "differentiated and unfolded through the traveller's interpretations" (p.4) – this is very different from theory discovery. His approach seemed to fit more comfortably with my expectation of what would happen in my investigation – that I would observe, describe and interpret – than grounded theory's expectation that I would uncover a hidden truth.

Similarly, Kvale does not focus on constructing (let alone discovering) *theories*³⁴; he talks of "knowledge" (p.4, line 29, for example), of "interpretations" (p.210 onwards), of "meanings" (p.187 onwards) and "understandings" (p.221 onwards) or "inferences" (p.233). Again, this fitted better with my expectation of what would result from my investigations: interpretations, understandings and insights, not hard-and-fast theories.

Regarding <u>language</u>, and its need to be 'cracked' to release meaning, Kvale does not subscribe to this tendency of grounded theorists to atomise, then reassemble in some more structured manner, what his interviewees say in order to makes their meaning clear. To him (see p.5, p.6, p.132 onwards), the sentences, as uttered, are the *bearers* of meaning and not barriers to it, and careful listening as well as analysis and description are all equally important in his method. He says "The medium of the interview is language and the knowledge produced is linguistic" (p.43) and "Active listening ... can be more important than the specific mastery of questioning techniques" (p.132).

A very important criticism of grounded theory made by Thomas & James is that it tries to emulate quantitative research rather than accepting that qualitative research is different, with its own methods, advantages and disadvantages. Indeed, Strauss & Corbin themselves say of grounded theory: "Its systematic techniques and procedures of analysis enable the researcher to

³⁴ He does use the word, but generally in the 'type (a) theory', Thomas and James' "why my geraniums are dying", sense.

develop a substantive theory that meets the criteria for doing "good" science: significance, theory-observation compatibility, generalizability, reproducibility, precision, rigor, and verification." (Strauss & Corbin 1990:31). Kvale, on the other hand, sees the two types of research as distinctly different, as "alternative genres [with] different rules of the game" (p5), with neither trying to emulate the other and this, for me, seemed a more useful approach to my investigation.

Finally, the strongest reason why I felt that Kvale's approach was more suited to my needs than Glaser & Strauss' (or Strauss & Corbin's, or other advocates of grounded theory) lay in the flexibility of its recommended methods and techniques. Simply following grounded theory's stringent coding procedures, which I tentatively attempted at the early stages of my analysis, did not turn out to be enough to generate in me a good understanding of what my interviewees were telling me, and comprehensive insights into what they were feeling. I found I needed a whole panoply of methods and techniques (including, as explained above, some borrowed from grounded theory) to tease out a fuller and richer content from my transcripts, to derive deeper insights into what my interviewees were trying to express. These methods are described in the next section: suffice to say here that Kvale's approach permitted this use of a variety of methods (Kvale p.203) and grounded theory, at least as I had understood it, did not.

4.2 Methods and tools

Kvale's methodology permits the traveller-researcher to choose from of a range of tools and techniques. His travellers may use travel guides to read up about the country before their journey, or start out relatively uninformed about what they might expect to find. They may follow a plan, or decide on their route as they go along, select carefully whom to talk to, or let chance dictate their encounters, record the conversations or trust to memory, and so on. In this section, I describe the tools and techniques I chose to use, and the rationale for and implications of these choices. The advantages and disadvantages of their use are discussed in *Reflections* below.

4.2.1 Reading matter

Because I started my research project with little knowledge of the subject which I proposed to investigate – in Kvale's metaphor, I knew which 'country' interested me but almost nothing about that country - my first decision was what to read before and during my travels. It would, of course, have been possible to start the whole journey of discovery without any pre-reading, with the intention of getting a first view of the country uncontaminated by preconceived notions. However, I felt that both the terrain and my ignorance of it were too vast for this to be a useful approach; I needed to narrow down the area to be explored. I could have focused on a historical perspective, in order to see the current state in the context of its past, but this would have been like concentrating on history books before visiting Singapore – in a new country which is in an exciting state of flux and has only a short history, it is usually more rewarding to read about the current state, with perhaps just a brief summary of what had gone before and some speculations about what might follow. I therefore decided to search for reading matter about my chosen country which would help me focus on which particular area to visit – it was too large to visit it all – and in what manner I might find it best to travel around.

I began by reading around the subject, exploring libraries, journals and the Internet for anything related to 'stakeholder satisfaction' (as I had initially framed my enquiry) with educational technology. And I found that the country was indeed large and diverse, some parts were better explored than others, some methods of exploration seemed to have been more popular than others (see Chapter 3) and some sources of information were considerably more useful than others. In particular, because the subject area was both new and fast-moving, I often found journals to be more useful than books and, for many topics, the Internet to be a more useful resource than the library – in many cases, a paper or materials for a book had already been superseded by more up-to-date material by the time it had achieved publication status.

Because of the nature of my methodology, involving gradual discovery of the focus of my research, I did not strictly follow a "classic" approach (Crawford & Stucki 1990) of 'pose the question – read – hypothesise – experiment – record'. Instead, I continued to read at a relatively even pace throughout the

research period, as my centre of interest shifted from "stakeholder satisfaction with technology use", through a number of intermediate steps, to my eventual focus ("teachers' responses to internet-enabled technologies" and the individual themes which emerged from my interviews). For the sake of clarity, however, Chapter 3, which describes my reading, is generally structured as if all this reading had been done at the start.

4.2.2 Interviews

As explained above, I chose to adopt Kvale's concept of InterViews as part of my methodology, but within this approach, there was considerable scope for choice in whom and how I interviewed. This section describes the choices I made in regard to interviewing tools and techniques, the rationale behind my decisions, and the consequent effects and implications on my research.

Interview style, focus, timing, length and structure

Despite my pre-reading having guided me towards teachers, rather than other stakeholders, and the UK, rather than any other geographical area, I was still not clear, at the start of my interviewing phase, about my precise research question. It was therefore necessary for me to use unstructured interviews, rather than structured ones³⁵. That is to say, I prepared myself with a very wide-ranging list of topics I might cover, I described my interest in the broadest terms to my interviewees, and I started with the most open of questions ("Tell me how you feel about educational technology") – as recommended by Kvale, p127 – then let a conversation develop from there. I felt that this approach was more consistent with my overall methodology, and more likely to clarify my focus and elicit expressions of people's feelings, than something more akin to a question and answer session would be.

I was not, however, entirely confident that this approach to interviewing would work well. I feared that my interviewees, those with whom I "walked and talked", might not talk about anything that would lead to a fruitful area of research interest, or that there might be so little commonality between what they talked about that I would find it difficult to draw conclusions from the

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³⁵ Which were anyway consistent with my methodology

discussions. I was also unsure about other details of the interviews: how long each should last, whether to cover the same topics in each, transcribe and maybe analyse each before holding the next, and so on. I therefore planned, and undertook, an initial 'foray' into my chosen country in the form of three practice interviews with teachers who were already known (and easily accessible) to me, in order to test my method out.

The results were very satisfactory in that the method did in fact work as I needed it to. The interviewees talked freely about a range of subjects, with sufficient differences between and within what each interviewee said to feed my curiosity about what might cause these differences, but enough commonality to enable me to define more clearly where I might focus my interest. They gave me some useful data (about their own feelings), raised a great many more topics in my mind than I had previously identified as potential areas of discussion, and which I now thought I should look out for in future conversations, and suggested improvements in my methods for the next set of interviews. This led me to use *continuous improvement* in my methods rather than conformity. That is, I each interview would inform the following ones, so that my conversations would gradually become richer and more enlightening, rather than my keeping the format and questions identical for every interview. I also decided, on the basis of these first conversations, to allow my interviewees to speak as long as they wished (until each conversation came to its own end) and to split my interviewees into sets, with the interviews in a particular set being held within a few days (or even hours) of each other, followed by a significant period of time within which I could reflect on both the method and the results. Chapter 5 gives further details on how this worked out in practice and Reflections, at the end of this chapter, comments on the benefits and potential disadvantages of this approach.

I should note here that my methodical choices, such as those described in the preceding paragraphs, were all guided both by my reading on recommended methods (see 4.1.4 above) and my previous experience — I had often found these methods (trial run, neutral opening question, interview 'setting' and continuous improvement) to be effective in previous interviewing situations.

Choosing the interviewees

There were a number of facets to the way in which my interviews were selected, as described in Chapter 5. However, although there were clear reasons for why I interviewed these particular teachers at these particular universities, the selection was in no way statistically based. This did not contravene Kvale's methodology; he talks of "entering into conversations with the people encountered" (p4), rather than of scientifically selecting whom to meet and interrogate. However, it is necessary to set out, at this point, one of the main consequences of my selection methods.

The three interviewees who participated in my trial run were selected largely on the basis of their willingness to act as guinea pigs and their familiarity with me and my work (to provide a safe environment for me to practice); consequently, they all belonged to "South University", my home university. My subsequent interviewees, however, were all chosen from a different HEI – "North University" ³⁶ – for reasons which are explained in Chapter 5. My intention was to talk to a variety of teachers, and I was fortunate in being able to achieve this objective: the interviewee group as a whole (19 subjects in total, including those from both South University and North University) included technophiles and relative technophobes, both sexes, an age-group spanning 25 to "over 60", several nationalities and a range of experience with eLT from almost-novices to 20-year veterans.

Thus, my interviewees were very varied – both in terms of their backgrounds and current situation – which was certainly to my advantage in that it produced a rich mixture of reactions and feelings about the subject I was investigating but it precluded my being able to draw certain types of conclusion (related to age or university type, for example).

Environment and image

Immediately after my second set of conversations (this time with six teachers at North University), I was reflecting on my experiences during my long train journey home when I was struck by something which I thought was rather odd.

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I did hold a substantial number of extra conversations at South University during the verification stage of my investigation, but they were not formal interviews.

This was, that my impression of the set of conversations as a whole was one of unalloyed enthusiasm, that every one of my six interviewees seemed extremely 'upbeat' and enthusiastic in almost all their opinions, especially when compared with the first set of teachers I had interviewed whom I remembered as being much more downbeat and critical. I subsequently found it equally odd, when I came to transcribe and analyse exactly what had actually been said in each interview, to discover that this was not a truly accurate picture – the interviewees in the second set had actually brought quite a few criticisms and issues regarding the technology and those in the first set had been more enthusiastic about it than I had remembered.

After reflecting on these differences between my earlier and later impressions, I concluded that the environment in which the interviews were held could have had a significant effect on – at the very least – my *perception* of what had been said, and possibly even on what *was* actually said. The first interviews were held in a very dingy basement room (with no natural light), in the early afternoon (known as the 'grave-yard slot', when one is giving a presentation), on a Thursday. The second set were all held in a very bright, cheerful room surrounded by windows but on the fifth floor (so there were no distractions outside), in the morning, on a Tuesday. In short, there were a number of factors contributing to a more energised atmosphere in the second set than in the first.

A further factor which might have had an effect on me or my interviewees was my own image. The first conversations were with people who knew me quite well, but saw me as one of their students, a somewhat low-status role. The second set were with strangers, to whom I had been introduced as "a researcher from London", and who knew me to be a member of North University's governing body, a high status role. I certainly dressed (and possibly acted) differently in the two sets of interviews and this could also have contributed to differences I perceived between the attitudes of the interviewees.

As a result of these reflections, I tried to conduct my subsequent interviews in conditions as similar as possible to those prevailing at the time of the second set of interviews. While I could not always *exactly* replicate the conditions, I

tried to make them similar in the details which I could control (environment, timing, dress code, and so on) and I did not notice any further differences – whether real or perceived – in the general enthusiasm displayed by my interviewees for eLT.

Again, I wish to make it clear that these elements of my methods were the result of my own reflections, rather than advice from methodology books I had read. However, I have since become familiar with the efforts taken by a company which stages on-line exams (such as driving theory tests) to exactly replicate the environment in their many test centres, to ensure, they told me, that no-one is disadvantaged by an uninspiring environment. This I think is a similar idea.

4.2.3 Data capture and analysis

In this section, I describe and discuss the methods I used to study the material provided by my interviews.

Transcription

As described further in Chapter 5, I chose to record every interview, to transcribe every word of each of them myself, and to record body language, wherever possible and apparently relevant. This was in line with Kvale's recommendations (p160 onwards) and I did indeed find the results justified the labour: by repeatedly listening to the tapes while transcribing them, I found many further insights from the conversations. It was an iterative process; my reflections after each rerun of a tape guided what I noticed the next time I listened to it. Of course, I should have been able to achieve the same effect by simply listening to each tape several times but in fact the very process of typing, slowly and painfully³⁷, and endeavouring to catch every word, helped me to concentrate and to discover more each time I listened. And when I came to analyse each transcript, I found further insights everywhere, even in passages which had initially appeared to be to be of little interest. In summary, I derived a much richer picture through transcribing every word, and doing it

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³⁷ I was strictly a one-finger typist when I started this work and I did not improve with practice.

myself, than I would have had I employed a typist, or only transcribed the parts I initially found interesting.

Note: In theory, the interviews might have been even more illuminating if I had videoed them, and I did in fact consider this. However, I felt that the difficulty I would have in organising this, the inhibitions it might engender in my interviewees, and the amount of time the analysis of the videos would take, would offset the extra insights a visual record might provide, so I decided against it.

Analysis – general

When I came to analyse my texts, I followed Kvale's "ad hoc" approach (p193, p.203) to generate meaning from my transcripts. That is to say, I used a range of procedures, including some concepts from grounded theory (Strauss & Corbin 1990) moderated in line with the criticisms of over-rigid adherence to this methodology expressed in Thomas & James 2006.

In particular, I found grounded theory's concepts of *theoretical sensitivity,* constant comparison, coding and theoretical sampling very helpful to my analysis. The reasons for this are as follows.

Firstly, Strauss and Corbin define a researcher's *theoretical sensitivity* as his or her openness to the subtleties of what the data might mean (Strauss & Corbin 1990:41 onwards). They claim: "It is theoretical sensitivity that allows one to develop a theory that is grounded, ³⁸ conceptually dense and well integrated – and to do this more quickly than if this sensitivity were lacking" (*ibid*:42). They explain that a researcher may already have a high level of theoretical sensitivity at the start of the research (due to their previous experience, for example), but if not, they may develop it during, and through, the research process. This latter case was precisely my situation: my theoretical sensitivity was rather low at the start of this investigation because I was new to qualitative research and I had never been a university teacher myself, so I welcomed any method of analysis which would develop in me this

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³⁸ While I was not seeking a "grounded" theory (as explained in earlier) I still aimed for insights which would be conceptually dense and well integrated.

openness to the subtleties of what I was hearing. Chapter 5 describes how I used this concept in my research, and the benefits which I derived from it.

Secondly, the concept of constant comparison declares that an important analytical task of a qualitative researcher is to continually compare and redefine elements (such as basic data instances and emerging themes), throughout the research project, so as to become aware of similarities and differences as a part of the full range and complexity of the data and to be able to use these similarities and differences to help in the "development of concepts and theories" (Richardson 2000:78). I found this approach very helpful when I was looking for themes – for example, almost every interviewee expressed concern about student plagiarism but only a few brought up the subject of plagiarism by other academics, leading me to examine more closely why some teachers did not agree with the prevailing views, and why the one sort of plagiarism was a concern but the other, apparently, was not – and there were numerous other similar examples of interesting concordances or contradictions. In addition, as explained earlier, I did not start with a predefined theory and therefore needed a method which would help me develop one³⁹. The concept of constant comparison was therefore very helpful for harnessing the main strength of my data (its correspondences and contradictions) and helping me construct meanings from it.

Thirdly, grounded theory's method of *coding* data elements requires researchers to develop open-ended indexing systems by working through their data and generating codes to refer to a whole range of elements, from basic concepts to very high level categories and themes (Strauss & Corbin 1990:57). They explain that this is a creative process, requiring researchers to *interpret* the data, both to help them construct theories and to overcome any tendency for research processes to be cramped by over-rigid methodologies. The latter was not an issue – I had chosen a far from rigid methodology and was unlikely to be cramped by it – but I did need to construct meanings from my data, rather than test predefined theories, so some sort of coding process appeared to be very appropriate to my needs. My coding differed somewhat from that

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³⁹ At least in a Thomas and James 'type (a)' sense of a theory being a tool for enabling thought about a subject

advocated by Strauss & Corbin, however, in its rigidity, as explained further in Chapter 5.

Finally, Strauss & Corbin explain that the researcher's aim should be to develop a conceptually rich, dense, grounded account, and therefore the researcher is "not obliged to sample multiple cases" where this would not extend or modify his emerging theory (ibid:176 onward). Accordingly, they advocate the use of theoretical sampling, which is the process of choosing new samples, as the research progresses, on the basis of concepts that have already proved to be relevant to the evolving theory, for example because they are repeatedly present or notably absent in most of the incidents (here, conversations) being compared. Pidgeon 1996:78 says of this technique:

"Accordingly, sampling is often explicitly driven by theoretical concerns, with new cases 41 being selected for their potential to extend or deepen the researcher's emerging understanding (and not merely for generalising the findings of the research, as is the aim in random sampling). [Sampling] depends on incidents and analysis which have gone before as concepts and relationships accumulate ... It also increases depth of focus: in initial sampling, the researcher is interested in generating as many categories as possible but later, the focus is on exploring certain categories in greater detail".

This approach exactly fitted my circumstances and my (Kvale-inspired) interview methods. For example, there was no particular limit on how many interviews I could hold and I needed to work out as I went along how many would be a necessary and sufficient number – and a method which permitted this situation, and even turned it to advantage, was eminently appropriate to my needs.

The timing of my analysis

Kvale does not say when interview transcripts should be transcribed and analysed: after each interview, at key points during the investigation or after all interviews are finished, for example. In this investigation, I chose to transcribe each recording as soon as possible after the interview had taken place but to analyse my transcripts in sets. I thought about this decision carefully before implementing it. Might it introduce bias to my handling of later interviews, after

⁴⁰ Again, 'type (a) theory', in my case

⁴¹ A 'case', for me, being an issue with, or an aspect of, technology for discussion in my interviews

already having analysed earlier ones? Might it compromise the quality of my analysis, to know what other teachers had said in later interviewees? Might it be best to interview-transcribe-analyse one interview at a time, or all at the end? I decided that, if knowledge about a later interview *did* compromise the integrity of my insights from an earlier one, the damage was already done, and could not be avoided, in that I (naturally) held each interview, after the first, in full knowledge of what had been said in previous interviews. Further, the methodology *expected* each encounter to be informed by previous ones, so that conversations would become richer as the journey progressed. So, in short, I transcribed after each interview, so as to remember as clearly as possible all that had gone on (body language and so on) but analysed in batches because I could see an overall picture more clearly when considering a *set* of interviews than I could from examining interviews one at a time.

I note here that I do not consider the possibility of holding all the interviews, transcribing each immediately after it takes place, and only starting the analysis after all interviews had been completed. This option was not available — I did not know before I had done each analysis how many more conversations I would need in order to gain enough understanding of what I had heard to write an insightful traveller's tale. And in the event, I decided part way through writing my tale that I needed to make a further trip (hold a further set of conversations) before I could complete my story. I also believe it would not have been so fruitful — my analysis of each set of interviews certainly informed my conduct of the next set considerably and helped me to achieve a greater understanding as a result.

Analysis methods

In my analysis of the transcripts, I used a range of methods, including some borrowed from the grounded theory methodology. For example, I searched my tapes and transcripts for particular words (such as 'power' and 'trust'). I looked for metaphors (the 'tidal wave' metaphor discussed in Chapter 6 is a nice example), and analysed what appeared to be included in the metaphor – for instance, whether the 'tidal wave' might be implying the feeling of a lack of control over the changes brought by technology. I looked at passages which I had annotated with notes on body language ("interviewee leaned back and

looked out of the window") and listened for other indicators of emotion which I could actually hear on the tape ("talked louder/faster/in a higher voice") in case these might illuminate unspoken feelings. In all these cases (having found particular words, metaphors, or physical signs of emotion), I then carefully examined the passages in which the phenomena occurred to try and better understand what the interviewee was telling me, implicitly as well as explicitly. I also, where I could, returned to the interviewee concerned and tested my inferences by further questions about the things I had highlighted through these processes.

Coding, categorisation and contextualisation

It seems appropriate here to give further details about my coding methods. These were not 'high-tech' – I was unaware at the time of the tools which could be used for coding and so set about the task with highlighters and scissors. I marked up each transcript by high-lighting remarks which seemed to shed light on the interviewee's feelings, using different colours for those which seemed to relate to particular themes (see Annex B). Themes at this stage included those on which I eventually focussed (Control, Privacy and Knowledge Ownership) and about a dozen others (Power, Authority, Violence, Age/Sex, Subterfuge, Secrecy and University Role for example). I often recoded transcripts, as new themes emerged and potential themes died, until I had a set of multi-coloured transcripts, which I printed out and cut up, so as to be able to group highlighted quotes into related sets (Strauss & Corbin's 'categories'). I then designated some categories as sub-categories of others – for example, I decided that feelings about Secrecy and Subterfuge could best be seen as two sub-categories of Privacy, and that remarks on Power and Authority could best be classed as sub-categories of Control issues.

Finally, I reassembled my transcripts (or rather, looked at a new copy of each) to allow me to examine the <u>context</u> within which each remark or set of remarks had been made. For example, whether some topics had only been discussed near the end of the interview, or after I had prompted the discussion – or whether remarks were accompanied by signs of strong feelings (raised voice, etc) or contradicted other remarks by the same interviewee. This was how I noticed, for example, that most interviewees started by saying they <u>loved</u> the

technology, and only later rolled out a list of concerns, and that privacy was not a conscious concern for most of my interviewees, but that many of them had strong feelings on the subject, nevertheless.

Other tools

I also wrote over forty short papers — (my version of Strauss & Corbin's "memos") — on emerging themes and unusual events, such as conferences I attended (especially those at which I made presentations on my research) and observations on my interviews (for example, my thoughts on the effect of the environment on what my interviewees had said, or had seemed to say). And I took every opportunity to discuss my subject with colleagues at my 'home' university, at conferences and seminars, and even on social occasions — and generated a surprising quantity of extra, thought-provoking material as a result. In short, I used whatever tool I could find to squeeze insights from my conversations and was amply rewarded, as described in Chapters 6 to 9 below.

Dominant and linking themes

As will become clear later, my analysis produced three dominant themes which, when I reflected on them, caused me to speculate that they might be linked to or through two further themes ('Trust' and 'Identity'). I called these latter "linking themes", to differentiate them from the dominant themes. As I developed this line of thought, I went back to my analysis and looked at the relatively few interviewees' remarks which were associated with these linking themes. I have used some of these in Chapter 9 where I discuss a potential conceptual framework for the results. However, I need to make clear why Trust and Identity did not emerge as dominant themes and the three other topics did.

The basic difference was that Trust and Identity were only mentioned a few times by interviewees (and, in the case of Trust, mostly by only one interviewee) whereas the dominant themes had a large number of mentions spread across most of the interviewees. I had originally looked at 12 potential themes but the number of 'mentions' and 'mentioners' clustered markedly, with the three 'qualifying' themes all having a great number of 'mentions' and 'mentioners' and the others being low on both counts.

In my last set of interviews, where I re-visited some of my earlier interviewees, I specifically asked each of them if they had any views on the subject of trust or academic identity and all of them volunteered opinions, some of which I refer to in Chapter 9. These were useful to give further depth and richness to the analysis, but I did not feel they put Trust and Identity on the same footing as the dominant themes, as I had brought up the subject myself in these cases.

4.2.4 Validation

As Kvale points out, the main problem when considering validation of qualitative research is the issue of "how to get beyond the extremes of a subjective relativism where everything can mean everything, and an absolutist quest for the one and only true, objective meaning" (p.229). He tells the researcher "not to reject the concepts of reliability, generalizability, and validity, but to reconceptualise them in forms relevant to interview research", explaining that "the understanding of verification starts in the lived world and daily language where issues of reliable observations, of generalisation from one case to another, of valid arguments are part of everyday social interaction" (p.231). He explains this further as described below.

Regarding *generalisabilty*, he advises shifting the emphasis "from generalization to contextualization" and illustrates this by considering three types of generalisability: naturalistic, statistical and analytic. The first he describes as something we do "more or less spontaneously" in our day-to-day lives: "From our experience with one situation or person we anticipate new instances, we form expectations of what will happen in other similar circumstances or with similar persons" (p.232). He explains that the ability to generalise in this way from the specific instances observed in an investigation "develops for the person as a function of experience" (where the investigation is itself the experience concerned) and that it "develops from tacit knowledge of how things are and leads to expectations rather than formal predictions". I therefore asked myself, when considering whether my observations were "naturalistically generalisable", whether I'd developed strong enough feelings from this research about *how things are* to lead to an "expectation" of how they would be in similar circumstances elsewhere, or in the future – and the answer was a confident "yes" as discussed in Section 4.3.

Regarding statistical generalisabilty, Kvale notes that this "depends on subjects selected at random from a population" so when interview subjects are not selected at random "but by other criteria such as ... simply by accessibility" (p.233), the research may lead to valuable knowledge but the findings cannot be statistically generalised to the population at large. As this exactly describes my own situation – my interviewee selection process was considerably affected by availability – I did not make any attempt to consider statistical validity when reviewing the validity of my findings, or to claim any statistical validity of my conclusions.

Kvale describes analytical generalisabilty as involving "a reasoned judgement about the extent to which the findings from one study can be used as a guide to what might occur in other situations" and says that it is "based on an analysis of the similarities and differences of the two situations". Clearly, any such "other situation" to which the findings of my research might or might not be generalisable would have to be compared to the situations prevalent in my investigation. In order to facilitate such comparisons, I have described my 'situations', in some detail, both in the general description of context contained in Chapter 2 and in my descriptions of particular phenomena I observed and the insights I derived from them in Chapters 6 to 9. I have also reflected on this matter further in Section 4.3.

Turning to *reliability*, Kvale observes that this is important in most stages of the investigation, that there are issues of reliability to take care of during interviewing, transcribing, analysing, and reporting, and that, like validity, it is primarily a matter of the "quality of craftsmanship" of the researcher. I have described in Chapter 5 how I paid attention to these issues during the various steps of my research, and reflect in Section 4.3 on the effects of these measures on the reliability of my findings.

Finally, regarding *validity*, Kvale's approach is to move the emphasis from "inspection at the end of the production line" to "quality control throughout the stages of knowledge production" (p.236). He details measures which he

recommends at each of his seven stages of an interview investigation to support the overall validation of the research (Box 4-1 gives a summary of these), all of which I was able to follow, as described in Chapter 5.

Box 4-1: Validation at Seven Stages (abridged from Kvale 1996:237)

- 1. **Thematizing**. An investigation's validity rests on the soundness of its theoretical presuppositions and the logic of its derivations from theory to research question
- 2. **Designing**. The validity of the knowledge produced depends on the adequacy, for the study's subject matter & purpose, of the design & methods used
- 3. *Interviewing*. Validity here pertains to the trustworthiness of the subject's reports & the interviewing quality
- 4. *Transcribing*. Validation here involves the choice of linguistic style for the transcription
- 5. **Analyzing**. Concerns whether the questions put to the interview text are valid and the logic of the interpretations are sound.
- 6. **Validating**. Entails a reflected judgement of what forms of validation are relevant to a specific study, the application of concrete validation procedures & a decision on what the appropriate community is for a dialogue on validity
- **7. Reporting.** Involves the question of whether the report is a valid account of the study's main findings; also, the report's readers themselves validate it

In summary, he advises researchers to integrate validation into their craftsmanship, extend the concept of validation to include communication about their results, then let the results speak for themselves. He says that "ideally, the quality of craftsmanship results in products with knowledge claims that are so powerful and convincing in their own right that they ... carry the validation with them" (p.251-2). I followed this advice carefully and feel confident that the 'knowledge claims' which ensued are powerful enough to act as their own validation.

4.2.5 Ethical considerations

Kvale divides ethical issues in an interview-based enquiry into six categories: "informed consent, confidentiality, consequences, duty, utility and virtue" (p109). None of these posed any particular problems in this investigation. For example, all the interviewees volunteered after the research objectives and methods had been explained to them, none asked for confidentiality (although I did in fact choose to maintain strict confidentiality over what was said by

whom) and I could conceive of no harmful consequences which might ensue as a result of my investigation.

The only ethical issues I faced were over whether to name the universities concerned and whether my position at North University might compromise my investigation in any way. The matter of whether my decisions on each of these questions⁴² might have had any effect on my results is covered in Section 4.3.

4.3 Reflections

In the previous paragraphs, I have described how I came to choose my overall approach, and the methods and tools I employed within that methodology. However, although they seemed to me to be good – sometimes even inspired – choices at the time, I reflected, and continued to reflect, on these choices, to ensure they were indeed valid for the end I hoped to achieve. The fruits of my reflections are described in the remainder of this chapter.

4.3.1 What worked well?

Methodology

The approach I adopted did, indeed, work very well in a number of ways: it helped me with my research question, with my initial lack of knowledge about my subject and research methods, and with the handling of imprecise subject matter (feelings).

Firstly, my chosen methodology was enormously helpful in enabling me to clarify my research question. Even after I had decided that I wanted to explore university teachers' feelings about eLT, I was still unclear how to express my quest precisely enough for it to serve as a research question. Kvale's 'traveller' methodology allowed me to start work without a properly defined question and, as I went on and the research question still proved difficult to formulate, it helped me both to decide what to do next, and to gradually nail the question down.

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Which, evidently, were that I would not name the universities and not let my position at North University prevent me from holding my interviews there

Secondly, the 'traveller' approach did enable me to get started without knowing much in advance about the subject because the investigation really did resemble an exploration of a mysterious new territory which I could learn about as I went along. The idea that I could make my first, tentative foray without a clear idea of where I was going, then follow it with further visits, each guided by what I had observed on previous journeys, gave me confidence to start interviewing, and to continue with later interviews even when it had become apparent that each started from a different position of knowledge and understanding than the previous one. Without Kvale's approach, I would have worried that the lack of consistency in starting place for each interview (that is, my increasing understanding, gained from previous interviews) might make results impossible to aggregate, and hence limit their usefulness. Kvale's approach did not require aggregation, only interpretation, and allowed for this progressive increase in knowledge before each interview.

My third reason for finding my chosen approach apposite relates to the nature of my research topic. The whole investigation was about feelings – phrases like "satisfaction with", "discomfort with", and "response to" were freely used in the literature on the subject and my interviews were peppered with disclosure of feelings of all types. My approach, involving relaxed, unstructured conversations, definitely encouraged people to open up about quite personal feelings – "it's funny, I've never told anyone I felt like this before 43" and "I hadn't thought about this but I really *do* feel quite strongly on the subject, now I think about it 44" were typical remarks. Similarly with my chosen techniques: for example, the methods I used in the analysis stage allowed me to become aware of a huge range of feelings which were not at first apparent and would probably not have surfaced, had I stuck strictly to one approach such as grounded theory's coding procedures.

Tools and techniques

On the subject of my methods and techniques, my most important decision was to use Kvale's InterViews, which resemble two-way conversations rather than 'one-direction-question/reverse-direction-answer' sessions. I already

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⁴³ Direct quotation from Roger

knew from personal experience that it can be a help, when conducting interviews about emotions (which may be difficult for interviewees to describe or even recognise in themselves) to venture occasional opinions of one's own, express some reaction to what interviewees say or suggest new directions of discussion. I had always found that such interjections on my part tended to set my interviewees at their ease and make it easier for them to talk, and so I wanted to be free to use such devices in this research. However, I was initially concerned that this might be contrary to a more traditional idea of a strictly neutral interviewer who says little except to ask non-leading questions or reflect back the interviewee's own words. Reassuringly, Kvale's concept of InterViews, allowed for - even encouraged - such an interviewing style and made it appear very suitable to a situation which was more a joint discovery of feelings than an establishment of a truth already clearly known to the interviewee. In the event, I found that his InterViews did seem to encourage the teachers to talk about their feelings – after some slightly constrained starts, several of the conversations went on for more than two hours without appearing to run out of steam. Furthermore, it appeared to allow a very rich picture to emerge - full of contradictions and apparently submerged feelings, moments of passion and of reflection, of argument and apparent agreement, and even self discovery on the part of both the interviewees and interviewer.

Another tool which worked well was the use of 'postcards' – inspired by Kvale's traveller metaphor – which allowed me to write short descriptions of things I encountered along the way; these came in very useful when I finally got to tell the full story. For various reasons, this research has extended over an extended period and had I not written my postcards, on subjects such as "The Role and Purpose of Universities", "Data, Knowledge and Wisdom" and "Deceit and Secrecy", I would have been hard put to remember what I had read and thought these many years later.

Regarding analysis methods, my choice of techniques, which owed a great deal to grounded theory but also used some ideas recommended by Kvale and Thomas & James, also served me well. In particular, the concept of theoretical sensitivity helped make me aware of those areas (such as common

⁴⁴ Direct quotation from Edmund

reactions to technology) to which I was already sensitive when I started and those (such as teachers' particular concerns) to which I needed to become more sensitive to as I went on, which was very helpful towards improving my interviewing skills and my ability to analyse the transcripts.

In summary, both the methodology and my methods allowed me to develop a strong understanding of a subject about which I knew very little at the start of my journey and an interesting tale to tell at the end of it.

4.3.2 Criticisms

Like all methodologies, my chosen approach is not above to criticism. In this section, I consider possible weaknesses in the approach and methods as follows: the rather limited number of interviewees, the lack of statistical basis for their selection, the unstructured nature of the conversations, and considerations of generalisability and repeatability.

Number of interviewees

The first potential criticism concerns the *number of people* whose opinions I was able to explore and the total number of conversations which the methodology allowed me to conduct. Because it required very long, unconstrained conversations, I was only able to hold, transcribe and analyse some thirty interviews with nineteen different people. While reflecting on how much one can actually deduce from this number of interviewees and conversations, however, I have concluded that this was a feature (not a weakness) of the methodology: the traveller does not try to deduce that "all inhabitants of this country feel such and such" but rather to relate that he or she "met some people (or even just one person) who felt such and such" and that "this was interesting because ...". In other words, my aim was to hold a sufficient number of conversations to make an interesting, illuminating and thought-provoking story; this could have been four, forty or four hundred, depending on what transpired. Glaser & Strauss's notion of theoretical saturation may be called into play here: its recommendation is that the researcher should continue to sample⁴⁵ "until the theoretical saturation of each category is reached" (Glaser & Strauss 1967:61-62, 111-112). Strauss &

Corbin 1990 explains that this means that one should continue "until (1) no new or relevant data seems to be emerging regarding a category; (2) the category development is dense...; (3) the relationships between categories are well established and validated" (*ibid*:188) which is precisely what I did. In fact, I found that these thirty conversations were so rich in detail and complexity that these conditions were well satisfied by them and, even more remarkably, that these interviews generated more than enough material between them for *many* interesting stories, of which this thesis might be but one.

Interviewee selection

A similar argument applies to the fact that I did not – and indeed did not want to – select⁴⁶ a homogeneous set of interviewees – teachers of similar age, experience, gender, and the like – nor a number of interviewee-sets, each containing representatives of each type of teacher (male/female, old/young, novice/experienced, and so on) in the same proportions as those occurring in the UK HEI-teacher population as a whole. The aim of the research was to relate illuminating tales from the field, in order to provide insights into how teachers were responding to technology. This objective neither required a statistically balanced set of interviewees (since no statistically based conclusions were to be drawn), nor would homogeneity in its members have been a benefit. On the contrary, I felt that a degree of variety in interviewee characteristics was more likely to lead to a richness in the picture painted by the conversations, and as I did indeed encounter a great range of views and opinions in my interviews, I am confident that this was the correct assumption.

A further aspect of interviewee selection which could perhaps be criticised was that, when I revisited some of my interviewees (see Section 5.2.3), I only met with eleven out of the original nineteen. However, I can see no reason for meeting all 19 – the choice was again guided by theoretical saturation and 11 interviews was easily enough for my purposes. So, as with the original set, these teachers may be described simply as 'people I met (again) on my travels', and with whom I held further interesting conversations. And, as before, this was entirely acceptable within my selected approach.

⁴⁵ That is, in my case, continue to hold interviews

⁴⁶ See Chapter 5 for further details of my interviewee selection methods

Unstructured interviewing

Regarding interview structure, it could be a criticism that the conversations rambled, and covered only what occurred to the interviewee at the time, rather than exploring all his or her feelings on the subject. I aimed to counter this by allowing free expression until the interviewee seemed to have run out of things to say and then introducing, in a very neutral manner, any topics which I was particularly interested in but which had not yet been mentioned. This worked very well in the few cases where it proved necessary – for example, one of my interviewees (Stanley) talked unprompted for over half an hour and covered a lot of ground, giving me useful new areas to think about but contributing little to themes which had previously emerged. After he ground to a halt, I said "But, just looking back at some themes that have come up from other people plagiarism, people's rights to use your material that's on the web, your use of other people's material – are any of those issues in your area?" and he moved on very comfortably to give his views on most of these subjects. However, in most cases, enough was said spontaneously by the interviewee to provide me with further insights into most of the emerging themes, as well as some possibilities for new ones, and I did not need to resort to extra prompting.

Generalisabilty

I explained in Section 4.2.4 that this research is not, and was never intended to be, *statistically* generalisable but that I am confident that it is *naturalistically* and *analytically* so. I base my case for this on little more than feelings (I *feel* I understand how my teachers were reacting and why; and that my results and explanations make sense) plus the knowledge that my methods were careful and thorough and my results do not jar with those of other researchers. If I were to reword Kvale's test of *naturalistic* generalisabilty, I would ask if it "feels likely" for a broader group – and to me, it does. Likewise, for *analytical* generalisabilty, I would ask "did my methods and deductions logically imply this could be true for a broader group" – and again, the answer would be "yes".

Repeatability

It is not the case that qualitative research such as this cannot be replicated – this research could easily be repeated, and indeed, I hope it will be. I have carefully recorded the methods I used, the precise sequence of events which

occurred and any context detail which might have affected the results, so the same sort of conversations could be held with a similar set of teachers and the results could be compared⁴⁷. If this is done, I would expect (see *naturalistic* generalisabilty, above) the same themes to be present and hopefully others to emerge too, to shed further light on the subject of which I have only scratched the surface

4.3.3 Kvale's criteria

After considering potential strengths and weaknesses of my approach and methods, I checked my whole investigation against Kvale's measures for good research (Kvale 1996:236) in case there were flaws I might have missed. Kvale recommends that one should ask oneself the following about one's research: was it accurate, verifiable, ethical, complete and worthwhile?

1. Accurate and verifiable

The principal source of data was my interviews. Each of these was tape recorded (with the interviewees' permission), and I have retained the recordings to this day. I transcribed each and every word myself, soon after each interview, to ensure accuracy and to capture the tones of voice and body language which accompanied the words. I have retained all the transcripts, unedited, to constitute, along with the tapes, an audit trail of what was said, on which I built my story. I also kept the printed versions which I used to identify themes (I colour coded them to correspond to themes, sliced them up and sorted them according to topic, and eventually saved them all in a big box to add to the audit trail). And successive versions of chapters and postcards have all been saved, with version numbers, so an auditor could chart the progress of how my findings were made, and my story was put together

2. Ethical

The ethics of this study were not complicated, as explained in 4.2.5. however, I did have some concerns about confidentiality (whether or not to name the universities) and the propriety of doing my interviews at North University because of my privileged position there. Regarding the former issue, I decided

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Of course, even if exactly the same questions were asked of exactly the same people, which it would entirely be possible to do, the same set of narratives would not be generated but that is not the point.

against naming them (because their names had no relevance to my research) but I knew that a determined enquirer could probably deduce the names, should they so wish. However, I talked it through with my sponsors in each university, and we concluded that this did not matter as nothing had been said about either HEI which was in any way private or could cause them concern.

My second anxiety was about the possibility of any of: a conflict of interest between my Board membership duties and my research interests; my interviewees feeling obliged to talk to me, whether they wanted to or not; other researchers at the university resenting my intrusion; or my interviewees being unable to speak frankly because of my Board position. I therefore took great care with this aspect of my research design. I asked for permission and advice at all levels, I offered to share my findings with my interviewees and the other researchers at the university, and I took great pains over ensuring anonymity for my interviewees and I am pleased to say that none of these concerns translated into reality.

Having carefully reviewed all these, I feel I can confidently say that my investigation was an ethical piece if work.

3. Completeness

Following Kvale's guidelines, I proceeded very slowly⁴⁸ and carefully in my exploration, to ensure I produced a thorough and complete piece of work. I read around the subject, tested my interview method, held my interviews in controlled surroundings, transcribed and analysed the recordings, revisited my interviewees to verify my understanding and discuss my emerging conclusions, and kept abreast of the literature published during the latter stages of my research to ensure completeness.

4. Worthwhile

Kvale's final yardstick was to consider whether the work had made a useful contribution to the field of knowledge in which it was situated, and it was with this in mind that I reflected on the potential implications and consequences of my findings (see Chapter 10). As I explain there, I contend that the responses

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⁴⁸ Too slowly, I have frequently thought

and reactions to the use of technology such as VLEs which have been observed and analysed by me during this research were not previously well understood, and that the consequences of failing to understand, and take into account such feelings could be far-reaching, for Higher Education in general and HE teachers in particular.

By these measures, therefore, I am content that my research does meet Kvale's measures of good research. Two more questions remain, however, before I can be satisfied with my investigation; these are asked, and answered in the next section.

4.3.4 But is it research?

Finally, and most fundamentally, I posed two really difficult questions to myself: firstly, was what I actually did sufficiently rigorous (by Strauss & Corbin's standards) yet sufficiently sensitive (by Thomas' & James' standards) to produce results which others would find useful? And secondly, might this methodology be in danger of being so relaxed that nothing of real significance could be achieved by following it – should "telling an interesting story" be reserved for writing fiction, for simple entertainment purposes, or can it really be a good way of presenting serious research?

To address the former question first, I contend that my research methods were indeed an appropriate balance of rigour and sensitivity. Where rigour is concerned, Strauss & Corbin 1990:249 declare that "a qualitative study can be evaluated accurately only if its procedures are sufficiently explicit so that readers of the resulting publication can assess their appropriateness". I have therefore taken great care to do this throughout in my research: Chapter 5 describes my procedures in great detail, including the 'audit trail' I have kept to ensure evaluators of my research can if they wish verify these for themselves. Strauss & Corbin then go on to set out (*ibid*:252–8) criteria by which they would judge a piece of research, including those applying to the grounding of the work (which have little relevance to this work as it is not a grounded theory investigation) and those applying to process, which do seem relevant, as they appear to be to all qualitative research. They summarise the latter as being *the* means by which the reader is "able to make judgements about the

components of the research process concerned" (*ibid*:252); in other words, to allow each reader to evaluate for themselves the research as being appropriate to their own needs. By making details of the process I followed, the circumstances of each event, and the logic of my deductions absolutely explicit, I have made it possible for each reader to decide whether my research is sufficiently rigorous for his or her particular needs. For example (to take two extreme cases) a reader who wished to make a prediction that "all university teachers in the UK will certainly do such and such" would not find my research sufficiently rigorous whereas one who aimed to observe that "concerns have been voiced by some university teachers in the UK" may well find my work useful.

On the other hand, regarding sensitivity (one of Thomas & James' concerns), one of their requirements for good qualitative research is that it should enable "simple understanding" to be derived both from what we already know and from "our ways, as practitioners (and as human beings) of making sense" (Thomas & James 2006:790). They value "the original voice – the narrative – of both the respondent and the discussant in the research exercise" and cite as a prime example James Patrick's classic study "A Glasgow Gang Observed" (Patrick 1973) where "narrative is told simply and clearly with no pretence that by some methodological alchemy it will be transformed to something more secure in its epistemic status" (Thomas & James, 2006:791). They quote Gary Becker (Becker 1996:70) as saying that there are no recipes for ways of doing social research; rather, one has to have "imagination and ... smell a good problem and find a way to study it". A sensitive approach, indeed, and I contend that my approach was similarly sensitive. For example, as recommended by Thomas & James 2006:788, I allowed my own experience, from before and from during my investigation, to guide me⁴⁹, and I allowed my respondents to talk in whatever way they wished (even including the two who shouted at me) about whichever topics, within the my overall subject, that they chose. I did not impose one fixed analysis method, I used whatever appeared to give me the best insights into each passage, and I allowed the narratives, where possible, to speak for themselves. In other words, I adopted a very

sensitive approach, as befits the delicate matter of investigating feelings, while making my assumptions, circumstances, processes and observations explicit enough for others to be able to decide the relevance, or otherwise, of my findings to their own particular needs.

Regarding the second question – whether anything significant can actually be achieved by following such an approach – I take comfort from the many methodologists who certainly do believe in the value of stories. For example, Thomas & James say:

'But the point is not to be apologetic about narrative in social analysis. Narrative can be argued to offer more in the way of social enlightenment than putative theory, while forsaking its epistemic pretensions. By saying it is merely a narrative, we are saying that it is not a narrative **and** something else; rather it is a narrative and nothing else. There's no shame to be admitted in this. Nor does one assert that the ideographic constitutes an illegitimate kind of knowledge in educational enquiry. The particular and the narrative – the vignette, the portrait and the story – are valid and proper ways of doing educational enquiry." (*ibid:778*)

In summary, regarding the question of to what extent my work does constitute research, I contend that the two prime aims of research (as of teaching) are to promote further understanding of, and stimulate further enquiry about, a topic which is not yet perfectly understood, and this investigation undoubtedly met these objectives. Firstly, teachers' attitudes to technology are currently *not* well understood by anybody, even by themselves, and my conversations *did* generate significant insights into what (some) teachers were feeling. I describe these insights in detail in Chapters 6 to 9, and in Chapter 10, I address their implications for UK universities and their teachers.

Secondly, the conversations did generate a number of further questions (see Chapter 10) and so considerably stimulated my own interest in the subject, and that of the interviewees themselves and of others with whom I have since engaged in formal and informal discussions on the matter. Hence, I can confidently say that this approach *did* lead to valuable insights and further interest, and thus *was* an appropriate choice of methodology for my research.

Chapter 4: Methodology and Methods

⁴⁹ For example, in my choice of interview style, and in my concern about standardising the interview environments

5 The Journey

This chapter describes, and comments on, the main activities which made up my journey of discovery – what I did, and how and why – as a precursor to the telling of the related, and rather longer, story of what I observed and what I thought about the things I saw and heard. I record these events in the order in which they happened, to supply context for the rest of the 'traveller's tales' which are at the heart of this thesis and which are structured around topics, rather than dates and actions.

5.1 Phase 1 – Preparation

5.1.1 Developing an interest and some skills

I came to this research with a good deal of experience of information technology, some of higher education, very little of academic research and none at all of teaching. However, I was well aware of the rate at which the use of eLT was increasing in universities and how most people seemed to take it as read that this must be good for all concerned; and I did have some skills which I hoped would prove useful along the way. Thus, I had two huge tasks to undertake before I could even *start* planning my journey – deciding where exactly my research interest lay and learning how scholarly research is done at post-graduate level.

My first steps, therefore, were (predictably) to start reading and discussing two subjects — the use of computers in HE teaching and PhD-level research methods. The former enquiries were directed towards finding a good subject to pursue further. I searched libraries and the internet, and attended conferences, seminars and discussion sessions, all focusing on the increasing use of computers in HE, and I wrote informal papers on what I found. I read a multitude of books and papers on: what knowledge is about (Barthes 1975, Lyotard 1984, Russell 1992, Jarvis 1999, Saussois *et al* 2000 and many others); HE stakeholder objectives and the concept of HE stakeholder satisfaction (Jaffee 1998, Bacsish *et al* 2000, Fredericksen *et al* 2000, Winkworth 2000, Pupius 2001 and others); and the role of universities and HE

teachers' experiences of using educational technology (Warschauer 2000, Rogers 2000, Oliver 2001 & 2002, Conole 2002 a & b, Laurillard 2002, Mason 2002, Abson 2003, Britain & Liber 2004 and others). I attended seminars and conferences on similar topics, such as "Employability and Assessment" by Peter Knight, "Accessibility & Learning Technologies" by Claire McAvinia, "Screen or Monitor: surveillance and disciplinary power in online learning environments" by Ray Land and Siân Bayne, "Widening Access to HE: new culture or cultural change?" by Ron Barnett and Louise Morley and "The Shock of the Old" and "Beyond Chalk and Talk", a series of conferences in Oxford on the changes eLT was bringing to HE. The results were very interesting but, depressingly, covered an enormous range of topics and so did not seem very helpful to my need to determine a well-defined research focus.

The other set of enquiries seemed to be even less productive – I can see now that I didn't even understand enough, at the beginning, to realise how very little I knew about scholarly research methods. Furthermore, what I read on the subject (from Denzin & Lincoln 1994, Miles & Huberman 1994, Helman 1996, Richardson 2000, Silverman 1997 & 2006, Strauss & Corbin 1990 and others) seemed either so obvious (of course one must collect data, analyse it and write up one's conclusions) or so mysterious (so many new words and concepts) that I was quite unable to approach the matter 'head-on' at that stage. The result was that, while I consciously sought to clarify what my research subject might be, I only unconsciously started to discover what methods I might use. In other words, I began learning about research methods by trying to do things, by instinct or through guidance from those around me, and it was only after a while that I came to understand the many books on the subject which I collected in my first search for enlightenment.

5.1.2 First glimmers of light

I clearly remember two days (coincidentally, both in the same week) when I definitely detected a glimmer of light in each of the areas of darkness I was stumbling around. Regarding research focus, I discovered a comprehensive set of papers on "university teacher satisfaction" with learning technology, all published in 2000 in *The Journal of ALN* 4, a special edition devoted to the

topic. I immediately felt that this was both a very interesting subject and one which had great potential as an area for research, because all the papers were recent, all remarked on the shortage of research in the area, and very few were related to research in the UK.

Regarding research methods, I found Steinar Kvale (or rather, his book: Kvale 1996) and, in the very first chapter, his analogy of the researcher as a traveller. This somehow seemed to whisper to me (it was no more than a whisper at this point) how I might proceed with my investigations. This was something I thought I could understand, something I might take inspiration from, something I could possibly use as a basis for learning more. My task began to feel less hopeless.

The result was, at this stage, neither a clearly defined research question nor a definite methodology and set of tools to use in my research. Rather, it was the beginning of an idea about where my interest might lie – the subject of "UK university teachers' feelings about the use of IT" – and how I might pursue it – as a traveller on a journey of exploration. It was a small step, but it was a start.

The path from this point to that where my research question and methodology were well defined was still long and arduous, principally because of my own mathematical background (see Chapter 2). I was accustomed to, and had a distinct preference for, numerical methods, mathematical precision and blackor-white choices. It was a huge struggle for me to decide - and accept the consequences – that qualitative methods, with their apparent imprecision, and ranges of feelings (rather than, say, being either "satisfied" or "dissatisfied") would be more appropriate to my quest. I looked for and eagerly read papers reporting *percentage* measures of teacher satisfaction (Almeda & Rose 2000; Arvan & Musumeci 2000); I read papers about VLEs which had been 'successfully' or 'unsuccessfully' introduced; and I tried to divide my interviewees into those who were "positive" about the technology and those who were "negative" and compare the numbers in each group. Only after considerable reflection did I decide that these, and similar, tendencies and temptations were unhelpful to my effort to understand the breadth and depth of teachers' feelings about the new technologies they were using. This struggle was in itself part of my journey; I gradually came to accept that qualitative

methods were not *inferior to*, but simply *different from*, quantitative ones (Kvale was helpful here); that numerical precision did not necessarily lead to a greater truth; and that black-and-white pictures could often provide less information than multi-coloured ones.

5.1.3 First interviews

Having decided to abandon "satisfaction with" and focus on "feelings about" eLT (which was as precise as my research question had become at that point) and to follow Kvale's approach to qualitative research, it became clear that I needed to interview some university teachers and that this would be a crucial part of my data gathering, so it was important that I did it right. I had a lot of interviewing experience from my former work but none in academia so I started by interviewing three academics from my home university who were prepared to critique my technique. In the event, these interviews turned out to serve a dual purpose: they not only provided useful feedback on interviewing skills, as I'd hoped they would, but they were also very useful conversations, in their own right, about these academics' responses to the use of eLT in their teaching. I was therefore able to practice interviewing, transcription and analysis, reassuring me that this approach and this subject would indeed be worth pursuing, and also to start collecting data, even at this stage. Box 5-1 outlines the lessons I learned in this first phase of my research project and is included here as an example of the reflections I made throughout my investigation, in order to improve my methods, capture my impressions while they were fresh and use as a basis for discussions with ('postcards to') those with whom I was discussing my travels.

Box 5-1: Postcard 1 – Feedback and lessons from first academic interviews

I either realised myself, or was advised by my interviewees afterwards, that I should:

- 1. Use unstructured interviews to get good insights into the interviewee's actual feelings; structured ones might well be easier to analyse but they would reveal less
- 2. Prepare (just for myself) a paper before each interview listing the purpose of the interview, what topics I would like to cover and what I was particularly looking out for (eg themes, signs of emotion), and use this, not to constrain the discussion, but rather to ensure all intended topics are covered if possible, as well as allowing unexpected ones to be explored
- 3. Expect to participate in the interviews (see Kvale p. 36, 50) but take care not to talk more than necessary to stimulate discussion, or to influence what the interviewee might say (though K says one can't eliminate this entirely, just be aware of it)
- 4. Fully record each interview as well as taking notes: it's not possible to take good enough notes as well as engage in the discussion and think about what to say next
- 5. Start the recording before explaining anything (eg purpose of the interview, that it will be recorded and that all results will be anonymised) and ask "Is that OK?" so as to have a record that informed consent was obtained to the interview and methods
- 6. Begin each recording by saying the date, time of the interview and a way of uniquely identifying the interviewee, preferably not using their real name (for confidentiality reasons)
- 7. Try to record body language and other signs of emotion wherever these might have bearing on what is being expressed (eg reinforce it, or diminish its credibility)
- 8. Start from '0' on the tape-recorder counter each time and add the counter reading where possible to any notes made (eg about body language or interruptions)
- 9. Try to avoid, where possible, overtly checking the recorder or the time during the interview it distracts the interviewee
- 10. Allow enough time for all the interviewees to talk as long as they want to (but be prepared to stop if they seem to have had enough)
- 11. Be <u>very</u> careful to avoid leading questions look for ways of asking 'neutral' questions (eg "You said; can you expand on that?)
- 12. Transcribe the recording as soon as possible after each interview, to avoid forgetting impressions ("interviewee seemed agitated") which might be only briefly described in my notes or even retained in simply in my mind
- 13. Allow interviewees to 'wander' if they want to but bring them back to the intended subject matter after a while by saying something like "I recall you said earlier that ..."
- 14. Try and sum up at the end on the points particularly relevant to the interview subject and any surprising/controversial points, to give them chance to retract if they want
- 15. Ask them if they want to see a transcription (but don't push it unnecessarily or imply they can change what they have said they can only add further/later thoughts)

5.2 Phase 2 – Action

5.2.1 Second set of interviews and an upgrade

A positive outcome from Phase 1 was that I was in a much better position at the end of it to plan how to proceed. I chose where I wanted to hold my next set of interviews and wrote a description of my investigation, to use when asking for permission and interview volunteers. I got permission from North University's Vice Chancellor to hold my interviews there and received the services of a 'sponsor' (the Pro-Vice Chancellor for Teaching and Learning) to help me set it up. Having agreed with the latter how best to solicit interviewees and how and where to meet them, I asked for volunteers (via e-mail), arranged interviews and held a second set of conversations, which I recorded as before. I transcribed and analysed these, reflected on what I'd heard, wrote papers (see Box 5-2) on what I'd learnt about my subject and methods, and held discussions with mentors and peers on different aspects of these results. Finally, I wrote a report (my Upgrade Paper), detailing my actions, findings and plans, in support of my claim that my topic was worth investigating, my methods were likely to be successful, and I was capable of doing research. I successfully defended this at my Upgrade Review and achieved the formal status of research student. Apart from being a necessary step in the university's process, this whole experience, in Kvale's analogy, constituted my first real visit to the country I was exploring.

Note: I developed a habit of writing short papers from time to time on subjects which were troubling, or of interest to, me at the time. These were my 'postcards home' in my traveller metaphor. Some of them were read by no-one except me; they just clarified my thoughts or recorded some new knowledge, and were filed, for possible reference later. Others were the subject of discussion with my research supervisor or, in a couple of cases, went on to become conference presentations. Many of them, however, proved useful later when I was writing this thesis. Box 5-3 gives examples of some subjects of my 'postcards' and of the use to which they were put.

5.2.2 Reflection and a third set of interviews

Having formally confirmed my research status, I embarked on a period of further reflection before designing the next stage of my investigation. As a result, I slightly modified my approach to conducting my interviews: for example, I took care to hold them all in similar environments to those of the second set of interviews (see Section 4.2.2 'Environment and image'), in case the room, interview timing, or similar factor might have an effect on my interviewees. I then I held my interviews and transcribed and analysed what had been said in them.

By this stage, themes were beginning to emerge and I began to experiment with different analysis techniques. I looked for metaphors (and found, for example, the 'Tidal Wave' and 'Trojan Horse' metaphors discussed in Chapter 6), 'themed' words (words relating to one topic, such as violence or power) and aural signs that the interviewee might be feeling strongly (by talking louder or faster, for example). I played and replayed my tapes innumerable times and found that I could, for the most part, vividly see, in my mind's eye, the interviewee while he or she was talking, thus enabling me to further annotate my transcripts with comments on body-language at points in the conversation. I had already made many such notes during the interviews, such as "leant back and looked out of the window: 11:06" and "got excited and banged the desk: 179", the figures denoting either the time or the tape counter (whichever I could see more discretely at the time), to help tie the comment to the correct point in the transcript. However, when playing and replaying the tapes, and 'seeing' the two of us together in my mind, I frequently found I was reminded, for example by particular words and a raised tone of voice, of some other sign of emotion on the part of the speaker at that point, so I was able to take account of these signals in my analysis. The important point about this phase was that I transcribed every word myself, soon after the interviews, and so was able to 'relive' each interview many times. In this way, I believe I got much more of an impression of what the interviewees were actually feeling (and this whole research was, after all, about impressions and feelings, not simply records of what had been said) than if I had out-sourced the transcription and simply edited the finished product.

I also revisited the literature, searching for books and papers on the themes which I had been drawing out of my data (my early reading had been rather general because I had not known what to expect from my interviews). I was now able to focus on writers who had been concerned with issues of *control* (for example, Bentham 1962, Freire 1970, Foucault 1977 and Castells 2000), *knowledge ownership* (e.g. Hodgson *et al* 1987, Saussois *et al* 2000 and Paechter *et al* 2001), and *privacy* (e.g. Land & Bayne 2002, Dawson 2006, Kuehn 2008, and Goold & Neyland 2009). In Kvale's analogy, I had read general guide books to my country before my first visit and was now able to read, in some detail, what had been written about the particular places I planned to visit next.

Also, during this phase, I wrote a lot more 'postcards' (see Box 5-3 below), gave some conference papers (for example, at the PhD-students' day of the 2006 and 2007 *Human Centred Technology Conferences* in Brighton) and authored a chapter which was initially accepted for (but sadly, then edited out of) a book on teachers' views of technology-supported teaching and learning (O'Donoghue 2006).

5.2.3 Drafting and checking

At this point, I felt I had everything I needed in order to tell my final story. I thought this would be so easy: I knew what had happened, I'd written postcards and my travel diary to remind me of details I might otherwise have forgotten and to keep in practice for the writing-up phase, and I had, after all, had a great deal of experience of writing reports in my previous employment. How wrong I was! This was the most difficult phase, partly because I did not, for a while, see writing-up as a part of the journey. For me, at that time, the journey was over. I had lived it, and loved it, but now it was finished and all I had to do was record it. The clue to how wrong I was lay in the fact that, on the one hand, I thought the journey was finished, that everything I needed was in my head and only needed writing down, but on the other hand I was patently unable to do this, (in part because, as I admitted myself, "I didn't yet know the ending"). I was overlooking the fact that the journey was *not* over, that there

was a great deal further to go, in the form of reflection and analysis, which would in fact be enabled by the writing process.

To return to my tale, I did after a while succeed in constructing a first draft of the core of my story, describing my results in terms of themes, and started to draw some tentative conclusions, then I found I needed to reconsider these through further conversations with my interviewees. I wrote a list of my main findings and conclusions and contacted all my previous interviewees to ask for a further discussion. Not all replied - some had moved on, others were perhaps too busy or felt they had done enough, but I was finally able to revisit over half of the original interviewees. I reflected on the implications of this reduced set of interviewees (see Section 4.3.2) but decided that, as I was simply seeking further clarification and insights into the themes I had identified, it was not necessary to re-interview more teachers than this to achieve this goal. In each of these latest conversations, I named the themes which had emerged from the interviews, without going into any detail as to what people had said about them (so as not to bias the responses I might get), and asked for the interviewee's feelings on these particular topics. I then used these views to help me further develop my ideas on the themes I had identified earlier.

I also took particular note, during this stage, every time any of the themes which I had identified in my research came up in informal conversations with and between my colleagues at South University about the subject matter of research (which was often, because the university was starting a project to change the institutional VLE, a move that provoked much discussion among the staff). Some of these remarks (for example: "Well, we can consult the staff as much as they like, but we'll still go ahead and replace the VLE anyway, because we [in the consultation team] know what's best, after all' were added to my collection of 'quotations illustrating attitudes', which I have not referenced in this thesis, as they weren't the product of formal interviews, but which nonetheless helped me to understand academics' responses to eLT a little better.

5.3 Phase 3 – Writing my story

I had an enormous amount of difficulty in completing what I saw as the final stage of my research: that is, the simple telling of my tale, the writing-up phase. A kind of break-through came with the realisation that this was not just a mechanical process, in which I set out an accurate record of my journey, but rather a further phase of analysis and reflection, inspired by and interwoven with the writing of the tale itself – that trying to write about my actions, my observations, my conclusions and reflections would clarify those same matters in my head and on the page, until, after many attempts, it would be done.

Once again, Kvale was helpful here. Although he broadly divides a qualitative interview investigation into seven stages (see Box 5-2), of which "reporting" is the last, he explains (for example, in *ibid*:87 penultimate paragraph) that these stages are not distinct and self-contained but rather, that they are repetitive and mutually reinforcing. He later observes that "the writing of reports takes on a key position in the interview inquiry. Reporting is not simply re-presenting the views of the interviewees, accompanied by the researcher's viewpoints in the form of interpretation. The interview report is itself a social construction ..." (ibid:253). That is to say, the researcher is still constructing meaning for his or her results while also engaged in the task of reporting them.

Box 5-2: Seven stages of an interview investigation (abridged from Kvale 1996:88)

1. Thematizing

Formulate the investigation's purpose; describe the investigation topic's concept

2. **Designing**

Plan study; take account of all 7 stages; consider knowledge to be obtained & ethics

3. Interviewing

Use i/view guide & reflective approach to knowledge sought & interpersonal situation

4. Transcribing

Prepare interview material for analysis e.g. by transcribing from oral to written text

5. **Analyzing**

Derive meaning from texts: use methods appropriate to research's purpose & topic

6. Verifying

Check generalizability, reliability and validity of interview findings

7. Reporting

Communicate methods & findings in a way which *meets scientific criteria*, takes *ethical considerations* into account and results in a *readable product*

This all seems rather obvious, after the event, but at the time it was another 'road to Damascus' moment. I take this as another example of how my black-and-white, reductionist tendencies conflicted with the needs of this type of research. My logic wanted a linear progression: decide on a subject and a method, follow the method to obtain results, form conclusions, then write it up. But I couldn't make this work, perhaps in part because post-modernism had arrived since I had formed my ideas on how research should be done. Kvale remarks that "a post modern movement from knowledge as corresponding to an objective reality to knowledge as a social construction of reality involves a change in emphasis from an observation of, to a conversation and interaction with, a social world" (*ibid*:268). In other words, the reporting phase is not the simple task of 'writing it all up' which I had envisaged, but a continuation of the 'knowledge construction' activity with which I had been involved throughout the investigation.

I also took comfort from Kvale's description of "the five hardship phases of an interview project", in which reporting is depicted as "the final phase of exhaustion" (*ibid*:256 and *ibid*:86). In the latter reference, Kvale makes it clear that it is very common for those undertaking interview-based investigations to feel that they have 'run out of steam' at the reporting phase, so that they either fail to complete at all or, at least they take an unexpectedly long time over this phase. My conclusion from this was that this was normal in research of this sort; the writing up phase was very hard, many others had become disheartened here, and I should just keep trying until it was done, however long it took.

Regarding the mechanics of my reporting, like Kvale I have use a variety of "different forms of writing about interview research" (*ibid*:276) including short interview quotations used as illustrations, longer quotations as exemplars of the sort of interchanges which took place in my interviews, tables and lists of 'objects' I encountered (for example, the list of early themes, WP22, I mention in Box 5-3), the separation of some pieces of text out into boxes (so as not to overly disrupt the flow of the chapter's main argument at that point) and sections of personalised narrative, such as this chapter itself. Parts of the report (specifically, the current chapter) are time-related whereas the main part

is structured around topics (for example, the context in which the research was undertaken) and themes. In this way, I hope to present a comprehensive account of my journey without it becoming tedious or difficult to follow.

I did find my collection of 'postcards' (see Box 5-3) and my 'travel diary' helpful at this stage. When I re-read some of the papers and reports which I had written during my trips, I was reminded of my thinking at that time, which gave me fresh insights into how and why my thoughts had developed and changed. This, then, had been a useful extension to Kvale's recommended approach and set of methods, as is discussed in my reflections on the methodology.

Box 5-3: Some postcards – and their eventual use

- 1. 1st Postcard: Feedback on interview techniques (Box 5-1)
 One page summary of interviewees' feedback
 Used for discussion on improving my interviewing skills
- Workpaper 2: Knowledge: what is it and can/should it be owned?
 7-page paper on "knowledge", with references to prominent writers on the subject
 Subsequently formed the basis of Chapter 7 of this thesis
- Conf. paper1: The human-computer interface in higher education does it meet anyone's needs apart from the students'? Do we know? Does it matter?
 Paper for post-graduate conference in Brighton, 2003 summarising my work so far Basis of several sections of this thesis, mostly in Chapter 1
- 4. Workpaper 8: My journey of discovery have I wandered down a blind alley?
 Discussion paper, summarising my progress and asking whether I should go on
 Clarified my doubts and confusions: persuaded me to continue
- Workpaper 17: Some notes on research methodologies and methods
 21 page paper on research methods and techniques, with references
 Formed the basis of Chapter 4 of this thesis
- Workpaper 22: Potential themes: first thoughts
 List of 12 potential themes including violence & age/gender effects (later rejected)
 Clarification & discussion leading to elimination of invalid themes
- Workpaper 93: Draft findings and theories
 1-page paper summarising the principal findings and theories from my research Informed my last set of interviews; formed the basis of Section 10.1 of this thesis

So, after the biggest struggle of all, my story was written, and rewritten, and refined and changed in the light of what the very writing of it had clarified for me, until, at last, it is well, not finished, for the story (and indeed the journey) cannot be finished while the territory is still imperfectly explored. Rather, it has reached a state where it is ready to be discussed 50 – a discussion which will in itself be an extension to – another phase of – a journey without a (foreseeable) end.

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Kvale says: "When interview travelers return home from their conversations with the people they met, their tales may enter into new conversations with the research community and the general public" (ibid:276).

6 Theme 1: Control

The analysis of my interview transcripts led me to identify three major themes: control (including power and authority issues), knowledge ownership and privacy (including issues of surveillance and deceit). This chapter is concerned with the first and strongest of these. I look first at the general issue of sense of control and authority in an information technology-based society, as perceived by McLuhan 1962, Toffler 1970 & 1980, Giddens 1984, Webster & Robins 1989, Mulgan 1991, Poster 1995, Castells 2000, Everard 2000, Graham & Marvin 2000, May 2000, Mitchel 2003 and others, and how people may be responding to these. I then discuss the various types of control issues in the HE teaching environment which my interviewees had talked about, including control over the technology and the teaching processes themselves, and balance of authority shifts from teachers to managers and administrators, to the students or even to the technologists. Finally, I reflect on the contradictions and confusions inherent in the responses described by my interviewees and why these might have arisen.

6.1 Introduction

Manuel Castells defines "informationalism" as "a technological paradigm based on the augmentation of the human capacity of information processing and communication made possible by the revolutions in microelectronics, software, and genetic engineering" (Castells 2005:11). He argues that we have entered a world which "can only be understood and changed from a plural perspective that brings together cultural identity, global networking, and multidimensional politics" (Castells 2000a:27): it is not possible to understand things without taking all three of these into account. He places strong emphasis on the networked society's effects on people's feelings (such as their perceptions of 'self' and their willingness to trust their leaders) and on where control lies ("whoever controls these networks and data controls the people", *ibid*:467). Although he principally talks about politics at a national/ state level, his arguments appear equally relevant to the smaller stage, such as the academia in general and an HEI in particular.

One of his claims is that "The power of flows takes precedence over the flows of power" (*ibid*:500); that is, the information flows (around a network) exert more power than the interrelationships of the people within the network. ("This networking logic induces a social determinism of a higher level than that of the specific social interests expressed through the networks" – *ibid*:487). He concludes that power "is no longer concentrated in institutions (the state), organizations (capitalist firms), or symbolic controllers (corporate media, churches). It is diffused in global networks of wealth, power, information and images, which circulate and transmute in a system of variable geometry and dematerialized geography" (Castells 2000b:359). A major implication of this is that power balances have been significantly changed as a result of the new internet-based information technologies in modern society.

My argument is that Castells' ideas about the effect of information technology on power in Society may be equally relevant to the more tightly defined 'societies' of academia and individual universities. Concerns expressed by academics about changes in values and beliefs, and shifts in power balances, in their world (their university, or their academic field) may be a manifestation of the same effect that is central to Castells' theory of a 'network society' which he is striving to understand and explain. By interviewing university teachers about their responses to the educational technology they use, and analysing their responses with Castells' ideas in mind, I was also seeking to determine whether similar effects can be detected and I return, in *Reflections* at the end of this chapter, to consideration of what might be learnt from the broader picture which could help us address the issues in the smaller one.

6.2 Types of issues

A recurrent theme in all my interviews was that of *control* – or more frequently *loss of control* – over the technology, the related changes, or even the whole teaching and learning process, as a result of the introduction of computer-based teaching aids such as a VLE. A closely related theme was that of a shift of authority caused by the new teaching tools and methods. Teachers expressed their feelings about control and authority both implicitly, through metaphors or evocative choice of words, and also on occasional explicitly. In

some cases this reduction of control or authority was seen as a positive thing; in others it was seen as threatening. Interestingly, several of my interviewees said they *themselves* did not mind a potential or actual loss of control or authority, but that their colleagues certainly did, which led me to suspect that some of them, at least, might be projecting their own feelings on to others.

As well as the *areas* where teachers felt they might be losing control, the conversations revealed the principal perceived *beneficiaries* of the control/authority shifts. These were seen to be any or all of: the students; the technologists; the university's managers and administrators; and HE policy makers. In the first case (control moving towards the students), some of the interviewees welcomed this change and some (more often than not, "colleagues" of the interviewees), disliked or feared them. A few clearly objected to the apparent power of the technology itself, in so far as it deeply affected their teaching when it worked in a way they did not like or even failed to work at all, and many appeared to resent the increased control of the university's management over their teaching methods and content. A few of the interviewees seemed to be overly concerned about the policy makers' ("the government's") possible motives in promoting the use of educational technology, and the consequent loss of authority or control for teachers.

6.3 Controlling change

Almost every teacher I interviewed talked about having some feelings of diminished control since their use of technology had increased. Some referred to only one example of this whilst others described a number of different ways in which they felt disempowered. One topic which many of my interviewees mentioned was that of control over changes in teaching and learning methods which the introduction of eLT had enabled, or even required. The following (Box 6-1) is one of the most colourful passages from the interviewees on this topic.

The speaker, Edmund, is a lecturer in a social science faculty, in his mid forties, with many years' of experience in using computers to assist his teaching, both in a University context and in his previous job as a school teacher. He was comparing his own enormous enthusiasm for the VLE ("oh, I

love it! You can do so much more to make the lectures, the courses, more interesting. ... Yes, I **really** like it) ⁵¹ with the attitudes of some of his colleagues and he was explaining his thoughts on why some people were 'early adopters' of the tool and others were slow or even determinedly resistant to use it. He said that he felt it was simply because "people are different" and their reaction to something as powerful as the introduction of educational technology was bound to be strong, and hence cover a whole range of possibilities. He said "I think some people *do* need help to get over their fears, or whatever, and I try to meet people's worries on a *personal* level ... and it's different, you know, for each person".

Box 6-1: Edmund: "A tidal wave"

"I like to use the metaphor of a tidal wave, or a river in flood, perhaps, and you've got to get across to the other side, you can't stay on your island for ever because it'll get smaller and smaller. And some people just take a massive jump, before the water gets too wide, and maybe get straight to the other side without too much problem, just with one huge effort, and others sort of try to swim against the tide, the river flow, but they get swept along anyway and eventually get washed up on the other side. And others find stepping stones and go across a bit at a time, and so on. What I tell people is, it doesn't really matter too much if you jump or you use stepping stones or whatever, the important thing is to get to the other side somehow or other, not to get stuck until there's no space left on your side and you get washed away!"

This short section of narrative seems to be very rich in meaning. The advent of technology is seen as powerful and irresistible, and happening very quickly. There is a sense that the phenomenon ("tidal wave" or arrival of information technology) is entirely caused by an outside force, rather than being created or at all affected by the 'island dwellers', or even by those who have 'swum to the other side'. The need is seen for a "massive jump" (the change cannot be gradual or without significant effort), although "stepping stones" (tools? training courses?) may help those who will not or cannot make the jump. And even those that "swim against the tide" should expect to get "washed up" on the

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His words were reinforced by the way his face 'lit up' at this point and the way he leaned forward, began to speak much more quickly, and made considerable use of emphasis and hand gestures.

side of the new technologies eventually (rather than drowning); only those who do nothing are expected to lose out entirely.

I was particularly interested in this passage because he clearly saw the move towards use of the new tools and methods as inevitable, and felt that those who failed to adopt it would eventually be unable to continue teaching ("get washed away"). However, far from objecting to this loss of control, he was positively exhilarated by the idea of this momentous force sweeping over his environment.

Edmund's attitude can be compared with that of Kevin, who is clearly a very reluctant user⁵². He had been required by his School to start using the corporate VLE a year before our conversation but has so far only used it for an informal quiz to help students assess their own progress. And he was keen to point out that "someone else" had set up for him – he did not display any sense of ownership of even this one application. Box 6-2 contains a quotation from him which illustrates his attitude to adoption of the new technology.

Box 6-2: Kevin: "I'm going to have to use it"

"I've just used it for a year. And what it is, it's a multi-choice test, so the students, er, basically, we have the normal classes and then in the module guide it says "Now you can attempt multi-choice Test 1". And so on. I didn't set it up. Somebody else set it up for me. I've no idea how to set these things up. ... I could probably have been on courses but ... you know how it is. ... No, I can see the VLE for, my use would be [just] for multi-choice tests, interactive questions, things like that. Pre session reading, no, I don't like that at all. I'll keep it for the multi-choice tests.

It looks as though I've been, I'm going to **have** to use it to send messages to the students ... [but] I presume somebody will show me how to do it. I mean, I haven't got a clue what to do but I'll find out at some stage, no doubt."

He has been asked how he uses the VLE and succeeds in making it clear, by his answer, that he hardly uses it at all, does not wish to use it, and really prefers to disassociate himself as much as possible from it. He says they have "normal classes" (implying technology-supported ones are abnormal?) and

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⁵² Unlike most of the others – he was one of only two unenthusiastic eLT-users in my whole set of interviewees

that "in the module guide it says" (distancing himself from any complicity with the ensuing suggestion) " 'Now you can attempt multi-choice Test 1' " (subtext "if you really want to"?). Although he explains that he did not set up the application himself, he doesn't bother to say who did (again, distancing himself from the application) and he claims, almost with pride, that he has "no idea" how to set "these things" up. He admits he could "probably" have learnt but implies he couldn't be bothered to do so, which is an interesting admission from a teacher. Finally, he concedes that he may be forced to use its messaging feature, but signals extreme reluctance to do so. I did wonder what he was about to say after "it looks as though I've been ..." ("overruled"? "beaten"?) when he changes his sentence to "I'm going to have to use it". I also wondered how good a student of VLE-use he will be with the attitude that "somebody" will "presumably" show him how to use it

Like Edmund, Kevin sees the change as something imposed by outside forces which cannot be actively resisted ("I'm going to have to use it to send messages to the students") but he is, in Edmund's analogy, being swept along by the tide and expecting to exert no effort in the process. A few, such as Percy (Box 6-11, discussed later in this chapter) saw it as imposed by external forces ("management") which could be opposed if necessary ("we would fight it tooth and nail, to be honest") but even here, there was a great sense of a power which teachers had little or no control over.

Some researchers, such as David Noble, have drawn analogies with the forced introduction of technology into other 'industries', and concluded that, like these earlier workers, academics will lose all control over their work environment, conduct and content. Noble says (2002:4):

"Like these others, their activity is being restructured, via the technology, in order to reduce their autonomy, independence and control over their work and to place workplace knowledge and control as much as possible into the hands of the administration. As in other industries, the technology is being deployed by management primarily to discipline, deskill and displace labor"

None of my interviewees reflected the view that this was the prime intention (or indeed, an intention at all) behind the introduction of this technology at North

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⁵³ The Spinning Jenny and its implications for home weavers, for example

University and many (the 'tidal wave-ists') seemed to see what was happening as simply a form of technological determinism: they appeared to perceive the technology as independent of the society in which they work while nonetheless it was significantly changing that society.

Clegg, Hudson & Steel 2003 found a similar reaction to education technology among education policy makers. They say that a "myth" of "the determining effect of technology" has developed and shaped government-inspired policy towards e-learning tools, and that the result has been "to present the acceptance of e-learning throughout the educational system as inevitable" implying that the "space left for practitioners in Higher Education is either to embrace the new media enthusiastically or to stand aside and watch its inevitable unfolding" (ibid:39). This is exactly the stance taken by Edmund and, in a negative way, by Kevin. However Clegg et al claim that this 'technological determinism' myth is untrue, in both beneficial and sinister ways. They argue (ibid:45) that "the forms new media take are historically emergent rather than technologically given" - that is, they may be based at least partly on, for example, existing teaching theory and experience. Further, they claim that, far from developing independently of the society they are affecting, the new media are being deliberately "shaped by managerialist agendas" (ibid:39) of HE policy makers and HEI managers, with the intention of controlling both the content and 'delivery process' of university teaching. But therein lies the heart of the problem: the evolution and spread of educational technology may not have been determined by technological factors alone, but it may have been shaped only by eLT procurers (HEI managers, purchasing policy makers and the like) rather than by its end users (teachers and pupils). Similarly, it may be that only this former group has the authority to guide or oppose the flow of the technology across the educational landscape; the end-users may have no such authority. In that case, the perceptions of Edmund and his colleagues are correct: the introduction of eLT is a tidal wave which may sweep away the traditional teacher, however effective an educator he or she may be.

I had thought that the key to whether or not teachers have any control over the introduction and nature of educational technology might lie in whether they have any say in the purchasing decision. I asked most of my interviewees

whether they had participated in this decision; they all said they had not had any input to it but most said they would neither expect to, nor wish to⁵⁴. The most common view was "That's for someone else to decide: I wouldn't want to" or sometimes: "I wouldn't know about these things". A lack of either or both of interest in this task and confidence in having the skills for it, was implied in such cases. But manufacturers often design to suit the purchaser, not the end user, and administrators are not necessarily fully conversant with the features teachers and students actually want and need in their eLT. It is therefore not surprising that teachers may feel they have little or no control over technological changes which they are encountering in their working lives.

6.4 Controlling the teaching process

While none of the teachers interviewed in this went as far as to complain of being "deskilled and displaced" by the technology (Noble 2002), several none-the-less foresaw a measure of reduction in control over the teaching process, or expressed some mistrust of the broader implications of the introduction of the technology. And indeed, on the evidence of these conversations, this mistrust may not be misplaced. For example, another interviewee (George) compared the new technologies such as the VLE to the Trojan Horse – a means of covertly introducing (unwelcome) changes into teaching practice, disguised as a gift (an exciting new software tool).

George is himself a university teacher but he has been very active in the implementation of eLT at this university. He describes (Box 6-3) his feelings about the role that the technology can take in promoting change in teaching practices.

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⁵⁴ A notable exception was Olivia who would have very much liked to have had a say in the university's choice of VLE but the decision had predated her arrival at North University (see the comments relating to Box 6-10).

Box 6-3: George: "A Trojan Horse" ...

You know, the VLE is a Trojan horse into pedagogy, for me. The problem we've got this year, to be honest with you, the big problem we've got is we've got a lot of people who've got other affairs to think about and they think "Oh, I'm a bit bothered right now and it's a bit of a novelty"... I've got about, I reckon, about 800 staff whom I need to take over the next hurdle which is "you need to change some of what you are doing". Now it might be assessment strategy, it might be the way you use course work, and e-learning is part of that, but you know you can't sit on your arse, so we've been on a series of workshops for "What next with my VLE course?" but it's not about the VLE, really, at all ... it's sad but true, that if you advertise something with "e-learning" in the title, people turn up but if you advertise it with "pedagogy" in the title ...

Q: They think, "I think that sounds boring" or "but I know all about pedagogy"?

Yes, "I don't need you to tell me about it" but if you put this 'e-thing' in people will come! People have got wise to us now because, you know, someone will say to me, "are you sure you don't need a room with computers in for this workshop you are running? It's about the VLE". And I say, "No, it's about change really". So that's what it's mainly about!

Here, George seems to be saying that he sees the technology as a way of introducing changes in teaching methods *despite the resistance* of some teachers to these changes. He makes no apologies for this⁵⁵; he seems to feel that the changes are inevitable and/or that the ends justify the means. This implies that his colleagues are definitely at risk of experiencing some loss of control over their choice of teaching methods – although few of the teachers I interviewed seem to have been aware of this, at least at a conscious level.

This passage appears to bring out several important points about George's attitude to pedagogy and the eLT: he sees his training courses as lessons in teaching methods, not in technology; although he is himself a teacher (which he has emphasised at the beginning of the interview), he does not seem to feel uncomfortable about making covert attempts to change other teachers' methods; he suggests that other teachers "have got wise to" him but that they

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⁵⁵ Clearly, it depends which side of the Trojan war you support, as to whether the Horse was a good thing or not, and the same might be said to apply in a possible 'war' between pedagogical traditionalists and those trying to introduce new teaching methods.

don't mind; and he has found that teachers will come to lectures about information technology when they would find lectures on pedagogy boring. The first of the above list would be unexceptional if it weren't for the purported deception and the implication that there is a war over teaching methods, with teachers under threat. The second and third imply that he, and his colleagues, may accept some loss of control over their own teaching methods, which is arguably their most precious area of expertise; and the last idea – that teachers would find courses about computing technology more interesting than discussions of pedagogy – I found extremely surprising and could offer no explanation for.

The subject of shifts in control over teaching methods has attracted a fair amount of recent research interest. For example, Holley & Oliver 2000:14 argue that "the choice of teaching techniques is becoming constrained by the decisions of senior management" and that, unlike previous pedagogical changes, which have generally been driven by educational and psychological research, the new movements have been instigated "through government policy", via HEI senior managers. They illustrate this assertion by a case study where tutors developing a new (e-learning) course were required by their management to make fundamental changes to the course (apparently because of commercial concerns) which would have destroyed the integrity of the course design. By substituting superficial cosmetic changes for the required changes, the tutors succeeded in resolving the problem but thereby proved, in Holley & Oliver's opinion, that the management concerned did not have the understanding of course design necessary for them to advise – or impose – changes in this way.

Similarly, McWilliam & Taylor quote a passage from Jennings 1995 which discusses pedagogical changes without once using the words "teacher" or "teaching". They point out (McWilliam & Taylor 1998:32) that in the passage: "teaching' has been displaced through its bifurcation into design and delivery"; that "these are held to be the outcomes of particular organisational and management processes and strategies"; and that "the stress is on constructing a more efficient loop from academic manager to instructional designer to 'deliverer' to learner, and [feed] back to academic manager". This view of

teaching was *not* shared by my interviewees – but many were concerned by the move towards increased management control over their teaching methods, as elaborated later in this chapter.

6.5 Controlling the technology

A classic area of concern relating to the introduction of technology is a feeling of powerlessness over the technology itself, and the teachers interviewed in this study were no exception. Many voiced concerns over the 'system' ("my computer seems to have a mind of its own – I tell it do one thing, and it goes off and does another" type of remark) and others felt they no longer controlled the environment in which they worked.

Roger is a case in point. He claims to be generally quite an enthusiastic user, at least at the start of our discussion, but then he gets more animated as he starts thinking of things he doesn't like very much (Box 6-4).

Box 6-4: Roger "Who's in charge here, it or me?!"

"One of my big problems is, I don't feel I control the system, you know – sometimes I think it's controlling me!. I spend ages putting some stuff up – on to the computer, you know – then it vanishes again. I don't know where it goes, it just vanishes, or turns up where I don't expect it. Or the system goes down – not working, you know – so the students can't get at the stuff. We seem to waste a terrible lot of time over that sort of thing. And when I just try to turn it on – to check my e-mails or something – I never know whether it will work or not, or what it will do, even. It has a mind of its own, sometimes. And when I want to do something a bit tricky, you know, something I haven't done before, and I go and ask the Help people how to do it, they say 'oh you can't do that, the system isn't built that way, it's not intended to do that, you'll have to do this other thing instead' which is not at all what I wanted to do. And I think 'so I have to do what the computer wants, not the other way round! It's crazy!! Who's in charge here, it or me?"

When he gets on to the subject of control over the technology (unprompted, except that I asked if he had any problems I hadn't covered), he starts to talk very fast and quite loudly, he leans forward, waves his hands around, and expresses himself much more forcefully than he had done before. As can be

seen from the Box, he feels frustration when the system doesn't work as he expects it to ("I don't know where [my stuff] goes, it just vanishes"), when it doesn't work at all ("the system goes down – not working, you know – so the students can't get at the stuff", and when it won't allow him to do something in quite the way he wants to. These are all clear signs of a computer user who feels that he is not fully in control of the technology and is not happy about it.

Roger is an intelligent, sophisticated user – he certainly doesn't believe that his computer is actually animate – but by saying it "has a mind of its own", he is voicing how it feels to experience the unpredictability of this technology. And the frustration he is expressing is not simply one of inefficiency ("we seem to waste a terrible lot of time over that sort of thing"); it is definitely one of impotence, of lack of control.

6.6 Controlling the environment

A further area of stress which surfaced during one conversation related to the control of the virtual teaching environment in which the teacher (Olivia) worked. At the beginning of the conversation, she explained at some length about the merits of different VLEs, and how the "best" one was the one which enabled her to structure her material in exactly the way she wanted to, using various complex hyperlinks between parts of the course. She also described her tension over the choice between working at home, where she had a more advanced computer, and at the university, where network access was better. In other words, she was both very skilled in using the technology and something of a perfectionist regarding her work. However, when she tried to demonstrate a point she was making to me, she became very stressed (see Box 6-5) because she found the system administrator had "moved things about" and renamed some elements of the system.

This is a clear example of someone who *likes* eLT, is good at using it, but is hugely stressed because the technologists have usurped her control over something she quite reasonably feels she should have been in charge of. One can deduce that the virtual teaching environment is analogous to a teacher's office (as indeed the VLE manufacturers portray it) and that Olivia feels the same as she would if someone came in to her actual office, re-organised the

filing cabinet and renamed her files (which I suggest no-one would dream of doing without her permission). Whether or not the technologists saw the change as an improvement is immaterial, this teacher clearly feels disempowered by her lack of control over the management of her teaching materials and the changes made by somebody else to their disposition.

Box 6-5: Olivia: PC rage

I can show you something of what I mean. Let me just see if I've got ... (turns to PC and starts to log in) ... um ... um ... OKaaay! ... they changed the system ... they change the system in some way, they change the system when you're away, and when you come back, and things have changed, like that log-in page didn't work ... (displays great stress and irritation in her body language) oh this is stupid, I hate when they change things, ... OK, while what they might think is an improvement, to me a change is an unnecessary complication. .. (sound of furious typing) ... OK ... "Unavailable" just means I haven't made access to the students yet, you know, they've just been copying ... "not available" ... hmm ... If I go into ... the what? ... the 'Module Documents'? ... where's 'Course Material?' ... maybe it's 'Module Documents' ... No ... They've changed these names, they haven't told me, so I'm now stuck looking for where my material actually is .. (sounds very stressed) .. and I don't know where it is, ... OK, .. 'Course Documents' is the new name for what I call 'Course Material' and of course, I had called, they've got this thing called 'Module Documents' which is what I had called 'Course Documents' ... right ...

6.7 Cui bono?

A corollary to this perceived reduction in academic control and authority was the question of where control was moving *to*, if it was moving *away* from the teaching staff. I never specifically asked about this in the discussions but almost every conversation contained references to shifts in power balances from the teacher to any or all of the students, the technologists, the management or administrators, and "the government" (a word seemingly meant to cover educational policy makers of all sorts who were external to the university).

6.7.1 Shifts towards the students

A particular aspect of loss or abdication of control related to control over the students' learning process, and even over the students themselves, in the classroom or in a remote environment. In Knowledge, Power and Learning (Paechter et al 2001:ix), the authors state that "The increased availability of information and communications technologies (ICT) ... raise issues about power and control related to that learning. New technologies have the potential to give increased power to learners to control when how and what they learn". This view was definitely reflected by almost all of my interviewees. As reported by them, some teachers (once again, sometimes just "known to" or "colleagues of" the narrator) disliked or feared this loss of control while a few others (generally the speaker concerned) positively relished it. This latter response is exemplified in the passage shown in Box 6-6. Here, the narrator (Stanley) is talking about an apparent loss of both control and authority. Firstly, he loses control (temporarily) over the teaching process, and to some extent of the students, when they start to talk to each other instead of listening to him; and secondly, he voluntarily relinquishes absolute authority over the subject by admitting the technology may be able to provide answers which he does not know. [Note: it would appear that Stanley's students are using some electronic communication devices, some hand-held web-access tools, which I had not until then expected to include in my definition of 'eLT'. However, as Stanley apparently saw these devices as part and parcel of the eLT he used, I saw no need to exclude these remarks from my analysis.]

Box 6-6: Stanley: "So you are losing control"

"I'll be in a big lecture ... and I'll be talking about an idea (you try and keep the focus on the idea, rather than on the technology) then I'll say "Well OK, let's see what the machine can show us about this" and everybody whips their machine out and starts doing it and immediately, you've got questions. And maybe I'll forget how to do some little thing and I'll say "Anyone remember?" and there'll be something coming from the back "Oh, just try this one." "Do this." "Mine does that. Why won't yours do it?" and so on. And you realise that you're beginning to work, you are still in a special position in that you're the, I hate to use the word "expert" but you've got experience which the students haven't got, but you've lost a degree of control in the classroom. And what happens is, I know that some people are frightened to death if there's any noise out there in the lecture theatre, but I get the biggest buzz when people are beginning to talk to each other and I say "hang on, what's yours doing?" and I often stop and let it happen for a little while. And so you are losing control and they're coming back in with their ideas and you've got to be prepared to let it go in different directions. It means, and I love that, actually.

I love that way of working. I can do the, I'm not being immodest here, but I can do the 'sage on the stage' stuff as well. Well, so they tell me! I can hold an audience and all that stuff but I love this, this interactive stuff. And in the talks that we've given around the world about this, we talk a lot about that kind of loss of control in the classroom. And about how you've got to lose the control in order to get the right kind of learning going, to get something interactive going. Some people find it very, very difficult indeed. They can't cope with that. They've got to go in, be on top of their subject matter, be sure that they know more subject matter than the students do, be sure that they can answer any question. One of the hardest things, I think, some people find is to admit you can't answer a question straight away. You know, to say to the people who are asking that question "Sorry, I'll have a go here but I think I might have to go away and think about it" or "I might have to go and ask so-and-so" or whatever it is. And to show that kind of slight frailty is, I think, very powerful in education. But some people find it very, very hard.

The discussion goes further into reactions to the possibility of the technology contradicting the teacher in the interchange shown in Box 6-7.

Box 6-7: Stanley: "To disagree ... is a really powerful learning experience"

Q: It's particularly obvious in maths, with the possibilities of somebody standing up and saying "But my calculator says that your answer is wrong". But perhaps it will come [in other subjects] when people have telephone access to the internet and can say "The quotation you just gave is wrong – I've just looked it up via Google". Do you think that could be a problem for some?

A: Yes. I think that's right. I think the fact is that people **do** find it threatening. And again, within my group, people have got used to the idea and some of us even regard that possibility as actually quite positive, because, you know, for two people to disagree over something is a really powerful learning experience and actually a lot more powerful than me just telling you the right answer straight out.

This teacher is clearly not himself concerned about loss of authority when the students discover (for example, by using the new technology) that there may be an alternative 'answer' to the one he is advancing. However, he does concede that some other teachers "do find it threatening".

Again on the issue of control over the students and their learning, another teacher likened the use of e-mail communication to a tennis game (Box 6-8) where he felt he was losing control if he did not respond quickly enough.

Box 6-8: Justin: 'It's like tennis ...

I don't know if you play tennis, the only way to win is to send the ball back to the [other] court. If you do that also with e-mails: "OK, we reply, back to you now, ball's away" [and] if you don't reply, people send a second or third then you [are] in trouble. I have a case this week, that is the third e-mail I received from this person today because it is a complex [issue]; I'm still thinking what to reply. It's not within my period of lapse yet but today he's going to get a reply. That's the third time he has led my reply⁵⁶, he's getting more bother at me and [he's] said "oh come on, I catch you now ". (laughs)

Here, when he talks about "winning" (by sending a reply quickly) and being "in trouble" if you don't, he appears to be describing his way of keeping control of the teaching process, after the advent of a new technology (e-mails). He has

⁵⁶ Justin was not a native English speaker.

devised a 'coping strategy' to handle a problem described in several other conversations.

By contrast other teachers, when discussing the same issue, described different coping strategies; for example, deliberately not responding immediately, particularly if the e-mail came late at night ("If you're online and they bite you at 10 o'clock at night, don't reply!" advised George) or setting times when electronic communication will be allowed ("you can communicate with me almost any time you want to - I'm not saying I'm going to respond immediately but I will be able to pick it up" was Matthew's approach) or even when it is required ("I say to them, right, we're meeting next Wednesday, I want [your draft] by the latest next Friday ... as a Word document attachment to an e-mail" – Matthew again).

Several narrators described the choice between constraining the student to progress through the course in the sequence intended (that is, controlled by the teacher) or allowing them to follow it in any order they liked. ([there's] "the tension between you wanting to have things that students have to progress through in a particular order, or them wanting to be able to make their own links, and that kind of thing"). This implies an awareness, perhaps even a concern, about control over the teaching and learning process moving away from the teacher and towards the student.

6.7.2 Shifts to the technologists

When Roger complains (Box 6-4): "so I have to do what the computer wants, not the other way round! It's crazy!! Who's in charge here, it or me", he might appear to be saying the computer itself is usurping his authority. However, he has set the scene as follows: "when I want to do something a bit tricky, you know, something I haven't done before, and I go and ask the Help people how to do it, they say 'oh you can't do that, the system isn't built that way, it's not intended to do that, you'll have to do this other thing instead' which is not at all what I wanted to do". It is therefore more likely that he is using "the computer" metaphorically, and actually intending to complain about the inappropriate authority of the technologists (the "Help people" or the system designers), not the machine itself. Similarly, Nigel gets suddenly impassioned (Box 6-9) when

describing a feature of the system which he hates but which "they" (the technologists) insist can't be changed.

Box 6-9: Nigel: "They say that they can't change it!"

"I do **not** like being called an instructor! That is culturally wrong. We are not instructors!

What would your preferred term be?

Tutor. Teacher. Lecturer. Anything but instructor. The last thing we want to tell undergraduates in a discursive subject in the fourth year is they are being instructed.

It's not a good word, is it?

It's a terrible word!

Have you told anybody this?

Yes!

But they don't care?

No. They say that they can't change it. You know, listening 'between the lines', I'm sure they can't change it locally and the Americans don't **want** to change it."

Finally, some concern was expressed about the general concept of the computer itself gaining control ("there's also the thought that you don't want it to take over"). This narrator (Percy) went on to express a concern about "the thought on the part of certain university administrators that it might be a good idea, because clearly a naïve thought would be 'it's cheaper'..." and several other teachers made substantially the same points: firstly, that the technology must **not** be allowed to 'take over' and secondly, that the university managers ("administrators") might think it would be cheaper to replace teachers by technology (but that they, personally, did not believe that it would).

This feeling, of losing control to the computer (or at least, to its software designers) is interesting because information technology is generally described, at least by its exponents, as a "tool" with associated implications of control by its users and of choice over whether and how to use it. For example, Cousin 2005:119 quotes the UK's Learning and Teaching Support Network's view of educational technology as "mere instruments, without any intrinsic

educational value [relying solely] on the use that is made of them, both by educators and by students". This view seems to be lacking among many of the teachers in this study, even some of those who embraced the technology's introduction with great enthusiasm.

A contrasting view is taken by Cousin, however, based on the opinion of Davis 1993:9 who claims that "technology is neither a devil nor an angel. But neither is it simply a tool, a neutral extension of some rock-solid human nature". Cousin argues that "far from being 'mere instruments', technologies are constitutive of our identities" and that (*ibid*:118) "technologies work dynamically with pedagogies, not for them" (nor, by implication, vice versa) "and in the process they become mutually determining". Her view is that an insistence that VLEs (for example) are simply mirroring the traditional teaching world – reinforced by calling them names like "Blackboard", by describing their functions in terms of "conventional academic centralising practices of teaching, assessment and supervision", and by constantly stressing their role as simple 'teaching enhancement' tools – is actually counter-productive to the aim of enabling teachers to grow into desirable new teaching practices without stress and tension.

6.7.3 Shifts towards 'authority'

In North University, the task of choosing which particular VLE to select as the corporate standard had been entrusted to a committee staffed fairly evenly by information technologists, senior administrators, pedagogy specialists, and faculty teachers, with the last group therefore constituting about a quarter of the membership. There had been little consultation between this committee and the body of teachers as a whole and little opportunity for this body of teachers to voice opinions on the features which would be desirable in whichever system was to be selected. This may have been an eminently sensible way to undertake the selection – it may even have been the only realistic way in the planned timescale – but the result was that none of the teachers, at least at least among those that I encountered, felt that their opinions had been taken into account in the selection process.

The reactions to this situation varied. In some of the conversations, the matter of choice over which technology was to be used surfaced as a real issue. Unsurprisingly, this was particularly marked where the narrators had substantial experience of any VLE(s) other than the university's current 'corporate' one, and was generally defended in terms of the inferiority of the university's system, compared with some other system(s). Where the narrator had, in fact, adopted the corporate VLE (as, for example, in Box 6-10), dissatisfaction over lack of authority to choose which system to use is not explicit: but the quotations imply that the feeling is there.

Box 6-10: Olivia: "It's the weaknesses that strike me"

"When I came here, some people were using this university's VLE and I had to start using that one too. It's interesting to compare the three because their strengths and weaknesses are different and whichever one you are using (because of course I'm using this VLE now), but whichever one you are using, it's the weaknesses that strike you because that's where problems arise, where features arise, where slownesses arise.

What do you see as the differences?

..." some of them are more flexible than others. The second VLE, I think, gave me the greatest amount of flexibility. I could do more with it. The first was in theory totally flexible, in practice the school imposed a template [on us] and it was a pain. Our [current] VLE is relatively flexible but there are glitches and hitches and uploading complex things with lots of images and so on (which is what I do) is slow... and tricky ... not straightforward, not like up loading things should be. I can't say I would have chosen it, that's for sure"

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"We should have a <u>say</u> in what we have to use – I've probably got a lot more experience with VLEs than the people who chose this one, and it's <u>my</u> tool, after all!"

Olivia starts off by saying that all VLEs have their faults but goes on to compare the current one unfavourably with a previous one she had used. Her dissatisfaction seems to stem as much from her lack of control over which VLE she uses as from actual deficiencies in the VLE concerned; she clearly resents having had no say in the matter (although she could not actually have contributed to the decision as it pre-dated her arrival at North University). The

second quotation in Box 6-10, which came a little later in her interview, was one of several further allusions to her desire for "a say" in the choice of VLE.

Percy was another of my interviewees who made his feelings about choice of VLE abundantly clear. He described (Box 6-11) how he and some of his colleagues were very reluctant to use the corporate VLE, preferring to stick to their own school's 'home-grown' system, which Percy had had a large hand in developing. Like Olivia, he seemed to resent his lack of control over which VLE he used as much as having to change to a different one.

Box 6-11: Percy: "I think we'd fight it tooth and nail!"

Oh, ... so long as we're not prevented from doing what we are trying to do, it doesn't make any major difference. If they say we've <u>got</u> to have a [corporate] VLE site, well look, I think it's a waste of time doing so, but ...

But if they said you <u>couldn't</u> carry on using your thing, ... would you be irritated?

Yes! I think we'd fight it tooth and nail, to be honest! And whether we succeeded, of course, would be another matter but I think we'd do everything we could to try and make the point that it would be educationally disadvantage, disadvantageous to our students, it would be a retrograde step for them. And hopefully somebody somewhere would actually recognise that this was true. But I don't think we'd take it lying down!

I think the only way that we can really argue the case is on pedagogic grounds. Because, if we say "We don't like your system" that's not going to get us anywhere.

How do you mean?

It's not going to get us anywhere because they'll say "Well I'm sorry but that's not your decision to make". OK, fair enough. Again, I'm not particularly happy with this corporate involvement, everything has to look corporate and everything, but I don't think that's an argument that we're ever going to win, so we just have to accept that. But I think, as a member of staff here, as a member of the teaching staff, we should have some say in the way in which we deliver our materials. I think that is over which we can have say and hopefully we can win that particular argument. So far I don't think it's got to the point where we are in the threat of that, but you know, you do worry a little bit that it will come to that.

This teacher is clearly devising strategies to resist being 'forced' to use a different VLE to the one he had helped develop. He defends his attitude passionately on pedagogical grounds ("it would be educationally disadvantage, disadvantageous to our students, it would be a retrograde step for them"). However, he admits to disliking "this corporate involvement, everything has to look corporate and everything" while accepting that just saying "We don't like your system" will not be a successful approach, thereby seeming to imply that both of these factors are also influencing his behaviour.

By contrast, another teacher (Quentin) emphasised that "I've deliberately chosen in the work I do to use central systems whether I think they are the best system or not" (whereas "I do have colleagues who don't use it, who use their own systems"). He had exercised his authority by electing to change to the corporate system when his colleagues were staying with their 'local' one, and appears to relish this power of choice and be more content with using the VLE concerned, as a result. This suggests that allowing teachers some element of choice over their use of eLT, however small that choice may in reality be, might engender more satisfaction with the eLT's subsequent use.

Another way in which administrators, management or the "government" were perceived to be taking authority away from teachers was in the area of control over teaching materials. In Box 6-12, Roger is expressing his own and (he says) his colleagues' concerns about interference in their course content by either or both of "government" and management.

Roger evidently has little trust in his management, foreseeing the possibility that they might 'snoop' on his work and attempt to control what and how he teaches. He doesn't voice objections on the grounds that what they might impose could be inferior to that which he would choose, he just does not like the idea of them taking control over a matter which has been, traditionally, the sole province of the teacher. In other words, it is a power issue, not a quality one.

Box 6-12: Roger: "They could tell you what to teach"

But there is something, something that bothers some of my colleagues a bit. We talk about it, you know. It's a bit related to what we were talking about before, about buying in course content. As I said, I don't see them doing much of that but they could start interfering a lot more in what we actually teach. You know, a bit like in schools with the national curriculum? I wouldn't like them to do that. I mean, that's our area of expertise, isn't it? It's what teaching is all about, deciding what to teach, and how to put it over, then doing it. And they are already interfering in how we teach, telling us we have to use the VLE, that sort of thing, so if they start telling us what to teach as well ... well, we'd just become "course content delivery assistants", not teachers at all!

Who is "they"?

Oh, you know, the government at first, I suppose, as is happening in the schools.

Why should they do that?

Who knows why this government does things? All in the name of standardisation – "raising standards" they call it – but actually what happens is just the opposite! I think it's just a control thing – they want to control everything, this lot do.

Well, they could do it if they wanted to, whether or not you have a VLE

Ah, but it's easier with the VLE. It's so easy for management to come in and snoop on what your course covers. They can do it any time and you don't even know they've been looking. So if they, say, if they decide you should be teaching this and this and this, either because the government says you should be, or because they've decided themselves that this would be a trendy course — and believe me, they do that sort of thing from time to time, you've no idea — then they could tell you what you've got to teach and pop in on your web site from time to time and check see if you are doing it. Oh dear, I do sound paranoid, don't I. But it's the sort of thing we talk about from time to time when we are teed off with management interference, you know! Well, let's change the subject.

This transfer of control from academics to managers and policy makers is discussed by Holley & Oliver 2000 who link it to the introduction of managerialism within the public sector. They contend that the increased requirement for HEI managers to deliver both "more for less" (for example, to admit increasing numbers of students to their universities for a steadily

decreasing amount of public funding) and to demonstrate quantitatively the quality of the education they deliver has encouraged – or even forced – them to concern themselves with matters which had formerly been left to the academics concerned. In particular, they identify three crucial areas (choices of pedagogy, the judging of lecturers' performance, and the creation of presentational style) for which responsibility has moved from the tutor to HEI managers. They also identify two further areas (development of content and strategic development of course materials) where responsibility has moved, or may soon move, from tutor to someone appointed by management (e.g. a learning technologist or content provider). Certainly, such changes could be seen, in the eyes of some, as an erosion of teachers' authority and hence their status from 'learned sage' to "course content delivery assistant" (to quote Roger again).

6.8 Summary

In summary, my interviewees talked about having little or no control over the changes that were happening, over the technology, and over the virtual environment imposed by eLT; some accepted this situation but most did not like it very much. Almost all were slightly concerned about current or potential loss of control over the teaching process (how, rather than what, they taught) as a result of the introduction of the eLT. They saw power balances moving, variously, towards the management, the technologists, or even the technology (shifts which none of them liked much), or to the students (which some positively relished, but others were slightly nervous about). They almost all started off by saying how much they liked using eLT and only began to voice concerns after ten minutes or more of the conversation had elapsed.

In short, it appears from these narratives that the introduction of the new technology is being perceived by a number of the teachers concerned as causing significant changes to their control, status or authority and that this is a definite concern for at least some of them.

6.9 Reflections

Having described these reactions of my interviewees, I reflect on the differences between them, and how these findings relate to those of other researchers in the area. I also suggest some thoughts on the implications of such reactions by teachers, which I develop further in Chapter 10.

6.9.1 One man's meat

All but one of my nineteen interviewees talked about changed control and power balances in relation to the introduction of eLT, but they did not all react in the same way to these shifts. Edmund (of the 'Tidal Wave' metaphor) and Quentin both accepted the pointlessness or impossibility of resisting the changes, 'Trojan Horse' George positively welcomed the power eLT afforded him to slip in pedagogy changes under its umbrella and Stanley relished giving up control to his students ("I love that way of working"). By contrast, Kevin, Percy and Carl were adopting a 'passive resistance' approach ("I suppose I'll have to use it one day"), Olivia and Nigel were battling with the technologists and Roger was both frustrated about his lack of control over the technology and concerned about losing control over what and how he taught.

I wondered what might cause these differences and, in particular, whether Castells' theories about power and relationships in a networked society might shed some light on the matter. Castells 2004:11 defines "informationalism" as a "technological paradigm based on the augmentation of the human capacity of information processing and communication made possible by the revolutions in microelectronics, software, and genetic engineering" and it has certainly arrived in universities: eLT clearly augments HE teachers' "capacity for information processing and communication" and shifts in power and control are perceived to be of the results of this, as predicted by him. He suggests that traditional flows of power (in an HEI, this would be between teachers and students or teachers and managers) will become less significant than the "power of flows" between members of the community. In the pre-eLT days, the flows of power were generally the same for most teachers: one type of power-relationship between teachers and students, another with their managers, a third with technical support staff and so on. If the arrival of eLT leads to an

increased importance of information flows, which will differ between teachers according to whom they mostly give information to, or receive it from, then perceptions of power shifts will vary too. Stanley clearly communicated well with his students (as was apparent from his whole interview, not just the quotation shown in Box 6-6) and was very comfortable with the idea that information passing between him and them might be bi-directional. In Castells' terms, the "flows" between him and his students were good and he felt empowered by this. Olivia, on the other hand, felt that the technologists did not keep her well enough informed and took no notice of what she said – the flow of information between them and her was poor – and she felt very disempowered, and unhappy, with this.

Another of Castells' theories concerns the need to take a "plural perspective" when trying to understand a networked society (such as a post-eLT university). In "plural" he includes "global networking" (in the HE world, that would be the ability to relate to, and share information with, a range of other participants, including students, managers, technologists and peers), "multi-dimensional politics" (relying on complex power balances) and cultural identity (a subject I return to in Chapter 9). Perhaps, in order to understand why teachers are responding in different ways to the changes they have all remarked on, it might be necessary to take this plural perspective of their new "networked" world⁵⁷.

Regarding how my findings fit with those of other researchers (see Section 3.5), I have already noted that they did not support the findings of Dubrovsky et al 1991 (that those with knowledge and expertise tend to wield more control in a technology-supported environment) and suggested a reason for this. The views of Henkel's interviewees (Henkel 2000), who were divided on whether their powers were being eroded by administrators, or vice versa, mirrored my own interviewees' divided opinions. Likewise, both Holley & Oliver 2000 and McKenna 2001 find a strong perception of erosion of academics' power in an eLT-supported world, Bayne 2005 links changing power relationships with technology and sense of identity, and Laurillard 2006 links power, eLT and surveillance issues, so it would appear that the seeds of a theory relating all these factors have been around for some time.

6.9.2 Implications

To me, the main implication of my findings is the one I draw above, that it may be necessary to consider aspects of power and control, information flows and identity together if we are to understand the eLT-supported world of Higher Education.

And understand it we must, if we are to avoid the "future shock" predicted by Toffler 1970 as a result of too much change, imperfectly understood.

There are hints in my transcripts of many of the consequences predicted by me in Chapter 1 and by Holley & Oliver 2000. Clearly, Kevin is avoiding using the eLT (and hence losing out on some of the benefits enjoyed by the others), Edmund says those who won't take it up will "get washed away" as teachers, Roger complains of its unreliability and the stress and extra work it sometimes causes him, and Olivia, though evidently a skilled and avid user, is clearly losing some enjoyment of her job as a result of eLT. And Percy foresees a possible need to "fight tooth and nail" on an eLT-related issue – with an implication that if he loses, he would leave.

Chapter 6: Theme 1 – Control

⁵⁷ Which is what I do try to do in Chapter 9

7 Theme 2: Knowledge Ownership

After issues related to control, the next most frequent theme to emerge from the interviews related to people's ownership of knowledge. This chapter looks first at how "knowledge" is commonly defined and whether or not it should (or even can) be owned, to set the context for the discussions which follow. I then relate what my interviewees said on the subject, dividing these remarks into three types: unacceptable use of the interviewees' knowledge by other academics (including buying and selling of course materials by universities); interviewees' fears of breeching (albeit inadvertently) their peers' intellectual property rights; and student plagiarism. Finally, I discuss the contradictions and confusions which seemed to underlie what my interviewees said and, in an attempt to explain these, I return to consideration of knowledge and its ownership, examining in more detail what these concepts entail.

7.1 Introduction

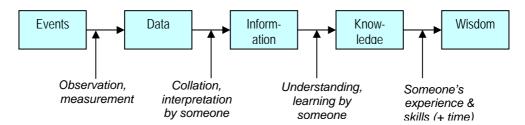
When analysing my interview transcripts, I became aware that intellectual property rights (IPR) and plagiarism, related both to the nature of knowledge and to its ownership, featured quite heavily in the conversations and that there was some confusion and contradictions in the views which were expressed. I tried to pin down what the word "knowledge" means and how this might affect teachers' ability to own it.

The Oxford English and Collins dictionaries between them give 20 definitions for "knowledge", covering a range of normal uses of the word. I analysed the shared elements of these definitions and inferred the following:

- Knowledge is usually associated with immutability once you know something, it won't change and you can forget it but you cannot 'un-know' it.
- Knowledge doesn't exist independently of a knower it is closely tied in
 with specific people who have skills or experience, understanding or
 intelligence and who recognise/acknowledge its presence.

I speculated that there might be a progress from events to knowledge, and maybe even further to something we call "wisdom", during which changes occur: people become involved (generally contributing effort), understanding

occurs, skills or experience are added, value is assumed or recognition obtained. For example:



The implications of this are that: information and knowledge exist only in the context of defined people (imparters and receivers); data is turned into information by collating, structuring and interpreting it, some which (the interpretation) must be done by the receiver; some degree of understanding and internalising (learning) has to be added by the receiver before information becomes knowledge; and, after skills and experience have also been added, and maybe a period of time has elapsed, knowledge might become generally valued and hence transformed into we tend to call "wisdom".

The very act of imparting data, information and knowledge can add, or cause to be added, nuances or opinion to it. Diana Laurillard 1993:114, in her discussion on the value of television as an education medium, describes how television "provides a vicarious experience through dynamic sound and vision, and moreover uses a number of technical devices to manipulate that experience". The implication here is that by, for example, magnifying one part of the picture, or lingering on another, emphasis can be given and relative importance ascribed to an otherwise 'objective' record of actual events.

This flow from data to knowledge has relevance to the question of knowledge ownership. From the above model, we may deduce that only *data* can be considered separable from the knower, able to be transmitted independently, and therefore open to being owned, bought, sold and stolen. By contrast, *information* is contextualised (defined only within the context of the person being informed by it), which makes the concept of its ownership and commerce somewhat meaningless. The argument becomes even stronger when one considers knowledge. If information only becomes knowledge after it has been internalised by the knower, the idea that it could be owned by another party as well as, or instead of, the knower seems illogical. Person A's

knowledge may be based on the same events and data as person B's, and may even have been interpreted by them both in the same way, but it is still in A's head, not B's and therefore personal to A, just as the knowledge in B's head is personal to B.

David Noble 2002:2, in his opposition to the 'commodification' of Higher education, states that "education ...entails not the disassociation but the utter integration of knowledge and the self... Here, knowledge is defined by and, in turn, helps to define, the self. Knowledge and the knowledgeable person are basically inseparable" ⁵⁸. Similarly Usher 2001:51 refers to "the intimate inseparability of knower and known, the known and the means of knowing". It would follow from these and similar views that, if knowledge is inseparable from the knower (and indeed even the means of knowing), it cannot be bought or sold, or owned by anyone other than the knower.

Clearly, then, the concern should be about the *use* rather than the ownership of knowledge, which could take some of the heat out of the ownership debate. For example, a university might ask its teachers to grant it certain rights over the materials they create (such as the on-line courses they develop) so that these may be traded for profit and clearly, there will be some negotiation over the exclusivity these rights. (For example, can teachers also sell their courseware, as they do their books, and if they move to another university, can they use their courses at the new place?). But these details can be worked out in time and lecturers might be comfortable with this, in the confidence that students actually seek their knowledge, or their wisdom, not simple their text or data, and the rights to this knowledge cannot be transferred away from them.

Nevertheless, there is still an issue over ownership of the *manifestations* of teachers' knowledge (which I will continue to refer to as their "knowledge" for the time being, for brevity) and it is this, and my interviewees' views on this, which I explore in this chapter, before returning to this underlying theory in Section 7.7.

⁵⁸ Which makes his concern over knowledge ownership somewhat illogical

7.2 Types of interviewee responses

Armed with these thoughts on knowledge and its ownership, I looked at what my interviewees had said on the subject. There were at least three variants of issues over knowledge ownership apparent in their conversations: concern over the possibility of other academics "stealing their work"; fear of using another academic's work without their explicit permission; and concern over student plagiarism. I describe each of these issues in turn in the following paragraphs before considering the deeper philosophical issues which underlie them.

A particularly useful conversation here was one I had with Justin because it covered most of the issues expressed by other interviewees, in one short passage, as shown in Box 7-1 below.

Box 7-1: Justin: "Isn't life a plagiarism?"

Q. Do you have feelings about plagiarism? Students see materials on the web and incorporate them in their work and then ...

You see I am still thinking about this. I ask myself "Isn't life a plagiarism?"

Yes, indeed, and isn't research?

Exactly. And I know that some people get so uptight about it! I mean, well I know the world is round because someone told me, I can't go there and measure it, every time I say the world is round I plagiarise someone who told me that. And I think, honestly saying, I think plagiarism is a part of learning. What I know I plagiarised from somebody else who told me, look A+B+C equals something. We do that in Maths. Maths is a total course of plagiarism. We don't teach 1+1=2, we plagiarise someone who has made that definition. But I think the beauty, the ideas have to be discovered to be learnt and they are... oh, we call it plagiarism but possibly we mould our thinking, our expressing, our talking, our writing, on somebody else's. I think sometimes we reflect society, we reflect other people. I'm not too bothered about that. But I do say to students that they are not being original in their work and there is no good jobs for people who are there if they are just copycats, they have to be original thought, and they say "but we can't, we do work based on somebody else's work because we haven't got time to do so, that's who we are". Plagiarism is the lifting things without acknowledging. If you acknowledge the source, people say "A, B and C equal 5 is his idea ". Therefore if you acknowledge that, it ceases to be plagiarism. I think, no, I'm not too bothered. I think the awful thing is if you start putting product formulae there and someone starts copying them without {you} making money. I think that's an awful thing that some people did research for too long to be treated like that. And what can you do with a thing like that? It's copying each other, isn't it? We are not so original as many people would like to think!

And so you feel OK about using other people's stuff in what you put on the web?

That's the big thing, isn't it, because, I don't know at what stage you are going to mention that, because we run a very serious line here in terms of copying things from other people so what I put in the VLE is my view, my lectures, my thoughts of somebody else's work. If there is something to acknowledge, I do acknowledge, otherwise what's there is mine and that's a serious problem to me to clarify, if we have copyright permission, to put notes, and notes of our teaching that comes to me straight from textbooks because that's copying without permission, so I'm not prepared to do it. My initial reluctance to do that was that I did not have sufficient material to judge myself of being original of those ideas so that is why I took a little while and everything I put there is very much what I could be accountable for. So therefore it's from within my understanding of that. But many people are doing that and that could be a big problem here because writers of textbooks are feeling a bit annoyed with that. And I don't like that, because I write and if I spend a lot of time and people just put in there⁵⁹, take it away, don't give any recognition or who don't make any living, how are the poor writers going to sustain their families, if that's not recognised? So that's one of my points, reluctantly to accept internet or the VLE, it's just the problem of who owns the notes, I don't think we should and I don't put, I myself don't put anything that don't belong to me and I think should be recognised. And that's the big issue, isn't it, because someone may do a marvellous work and put a summary, you know? And unfortunately one teacher of this summary, say they are like ... say he wrote a lot, and students read books about the approach, a lot of what he did, and I think he, like I did, my model, sometime he spend hours or days or weeks trying to put it together and the model is a summing up of all my thinking, the model I structure to implement an organisation. That's the key, that's all, my hinge, like a door, my whole thinking is in there. If you pick, take that up, the whole thing collapse and people just go with that and put it in a VLE or whatever and it devalues it, no probably it's faulty because what you need to know is just not there.

Without the richness of the text, you mean?

Certainly, and [the problem is] how to get that?

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⁵⁹ Justin was not English; I record what he said but the sense is sometimes unclear.

I found this a fascinating passage, not least because it covers so many different feelings in one short piece of narrative. For example, my actual question at this point was directed towards plagiarism by students and Justin acknowledges his concern about this but moves straight on to the subject of plagiarism by academics, both plagiarism of his work by other academics and the possibility of him plagiarising others' work inadvertently. The fact that he addresses in one response all three 'variants', treating them as facets of the same problem, led me to consider these problems as linked behaviours, rather than separately as appears to be more common.

A second fact that interested me in Justin's response was that he appears to contradict himself. He starts by saying that 'life is plagiarism' and, that he is 'not too bothered about' it, but in the next sentence, and again later, he expresses concern about others using his work without acknowledging or paying him. This led me to look for other instances of contradictory responses and to reflect on their possible causes.

Finally, he identifies at least three aspects of the issue of plagiarism: not according **recognition** to the original author ("Plagiarism is the lifting things without acknowledging. If you acknowledge the source ... it ceases to be plagiarism."); not **paying** the author ("how are the poor writers going to sustain their families?"); and compromising the **integrity** of the work ("If you pick, ... the whole thing collapse and ... it devalues it, no probably it's faulty, because what you need to know is just not there")

All of these points are explored below, starting with a discussion of the three main variants of this issue.

7.3 "It's stealing my work"

This concern was spontaneously introduced (that is, without being mentioned in any way by me) by two of the interviewees and many of the others expressed concerns when asked by me how they felt about IPR and plagiarism. In the passage above, Justin is responding to a question about student plagiarism but goes on (unprompted) to say "I think the awful thing is if ... someone starts copying them without you making money. I think that's an awful thing that some people did research for too long to be treated like that".

Although he has just said "Isn't life a plagiarism?" and that "What I know I plagiarised from somebody else who told me" when he was thinking of plagiarism in terms of students copying others' work, he feels a real concern when he considers other academics using his research without recognising, and paying him. Similarly, the following interchange (Box 7-2) occurred in my conversation with Roger:

Box 7-2: Roger: "It's sort of stealing my work, really"

Q: You are obviously very positive about the benefits of using technology like the VLE and the web. On the other hand, do you have any concerns, any issues with it?

Well, one of my **big** concerns about putting stuff on to a web site, and even in to the VLE though I suppose that is a bit more protected there, is the possibility of other people using it without my knowledge— well without my permission, and without giving me credit for it, I suppose. It's sort of stealing my work, really. I mean, it's so easy to copy big chunks of text from a web site and pass it off as one's own — I've seen it done— and I don't like the thought that that can happen to me!

When you say "without giving me credit" do you mean acknowledgement – or payment?"

Oh, acknowledgement — I don't expect anyone to actually pay! Though when you come to mention it, if I publish stuff in a book, I'm paid for it every time someone buys the book, so it would be nice if the same were to happen every time someone used material from my web site or my course. But even acknowledgement of the work as being mine would be nice ... On the other hand, I suppose I shouldn't put anything on the web if I don't want it copied should I? But I like to share what I've discovered, what I'm working on — it's good for my reputation — so it's a dilemma!

But it's surely nothing new, being able to copy other people's work? Hasn't it always been possible (and been done) ever since man learned to write?

Ah yes but it's much **easier** now – and the mechanism for paying people – the equivalent to buying a book – hasn't really been set up for electronic-based stuff – so it's easier to do and more difficult to pay. Well, impossible really – what do you do, write to the author and say "I read your work and can I pay you for the privilege?"!

Which do you mind more, not being credited or not being paid?

Oh, not being credited – I suppose I shouldn't expect to be paid! Or I wouldn't be in this job!

I find several things about this passage interesting. First, Roger points out the tension between, on the one hand, wanting to enhance his reputation (by putting details of his work on the web) and on the other hand, disliking others unfairly enhancing their reputations (if they copy it and don't acknowledge him as the source). Secondly, although Roger says he doesn't want to be paid, enhancement of his reputation might be seen as payment in a different currency. Thirdly, he suggests that the root of the problem is that it's easier to copy and more difficult to pay than with book-based work and finally, he feels that he may be open to being plagiarised (though he doesn't expand on how) even in the relatively closed world of the university's VLE. Overall, he has clearly thought about the issue quite deeply and evidently has some concerns, even though he is in general very keen on eLT.

An example of a response to a direct question about intellectual property rights is Brigit's reply (Box 7-3) when I asked "if you are expected to use other people's material, does that bother you in any way?".

Here, Brigit makes it clear that this is, for her, definitely **not** a financial issue – she had been paid to do the work, she would not have expected further payment for its wider dissemination (although she might well have done so, academics are paid for the books they publish, as Roger pointed out) and it was not work that she would have wanted to publish, anyway. However, she would have liked both recognition that she had originally written the course text (like Roger), **and** the chance to revise it, to ensure it was up to date and of adequate quality for the broader audience. This latter concern is no doubt even more important if the work is attributed to her – she would not want out-of-date work to be published in her name. She also disliked the idea that it might be sold to students, probably because she feels strongly about education being free to all. She concludes that concerns over 'ownership' of material might stifle the growth of availability of web-based materials.

Box 7-3: Brigit: "Nobody had asked me if I minded"

It's funny you should ask because just yesterday I was looking the web site of a colleague in a previous institution because she used to work in the same area that I did and I wondered if she had anything new in her site that I might want to read or refer to. And I just happened to notice that some work we had done about 5 years ago, that I was paid to do at the time, I was paid to develop the sort of university course for students, and I developed those materials and taught the course and that was fine and then I moved on. And then I noticed it had all been put on-line. And I had a look and I thought 'Nobody ever told me that this was going on-line and continue to be used' It was all the stuff I had written and done and I wasn't credited anywhere and I felt a little bit annoyed by that. Not the fact that it's up there, it's not ground-breaking stuff – it's not something I would try and publish or anything like that so it's not a monetary issue. But I was slightly annoyed that nobody said 'we are now going to take this material to make something a little bit more permanent'. And furthermore, no-one asked if I minded or if I'd like to make further corrections before it was going to have this very public airing. Nor did they think that it would be appropriate to put my name on it, simply because they'd paid me to do the work. Now, that bothered me just a bit. So I can see that there is something rather different about on-line course materials than, say, notes that are handed out in paper form. I'm personally not bothered about having my things up and people reading them and thinking about them and doing anything with them, but really, I mean it would be nice to be acknowledged or told if someone were going to take some of my handouts and use them in their course. That's OK; I'm not too bothered by that. But I think if I were to go and the university said like "we own all of this and we're now going to use it to sell on-line modules to students and so forth" I would be less than happy about that. ... And I think potentially it might stifle some of the growth in availability of on-line materials, if people think they are no longer going to have ownership of them.

All three of these teachers (and many of the other interviewees) had clear anxieties about the new technology enabling others to copy, or otherwise use, their work without them benefiting, either in reputation or, in some cases, in financial terms. This is a frequently discussed topic. For example, Van Bentum 2001, when writing about a survey conducted by the American Association of Learned and Professional Society Publishers into authors' attitudes to electronic publishing, specifically mentions copyright issues as being the main

concern of academics who published their work on-line and Gladney 2000, in a relatively short article focussing on IPR and electronic publishing, includes over eighty references to other writings on this subject. However, many publications in this area appear to relate to US-based research; this would seem to be a concern now felt (on the evidence of my interviews) by some UK academics but not yet the subject of as much research interest in the UK.

7.4 "Do we have copyright permission?"

As well as feeling concerned about their work being copied by others, many interviewees appeared anxious that they might inadvertently use other academics' work improperly. For example, Justin, in the first extract, says "that's a serious problem to me to clarify, if we have copyright permission" and adds that this concern had been one of the causes of him being a late adopter of the technology. Similarly, when I asked Leonard whether copyright was an issue (he was saying that he had wanted to include videoed interviews in his course on the VLE, but had met problems), he replied that it was (Box 7-4).

Box 7-4: Leonard: You run the risk of changing actually what they've said

"Yes it is. And it's why... the only bits that we've used so far are ones where the two Americans gave [explicit] permission for it to be used, and used in that particular context. The UK ones have agreed for it to be used as free-standing videos and that's the only use I've made of it. The actual use will have to be agreed and confirmed by all the participants, so there is absolutely no [unauthorised] use of material. To take one example, one person that I interviewed, a very experienced interviewee, having done a lot of OU work, and you get everything from him: bang, bang, bang, bang. Another leading academic, asked the same questions, gives a much more leisurely reply and the answers, you often find, are dotted around in various questions. Now, if you put the one beside the other, a student could turn round and say "oh, that's a dithery person" and it isn't, and you either edit (if so, you've got to get permission of the people to do that) and I think you run the risk of changing actually what they've said, so it's OK for them to be free-standing but to start putting them into tape and so on raises a number of ethical and also a number of practical questions. So I haven't gone down that route yet and when I do, it's going to be entirely with the permission of the people."

This passage was interesting because it relates to a rather innovative use of the technology: embedding video clips of interviews into the VLE material. Leonard had identified that permission to record the interview and allow students to view the recording did not necessarily cover including it on the VLE, and in fact the English interviewees did not agree to his doing this. It seems odd as to why this should be - there should in theory be no difference between allowing others to watch the interviews on a video player or on the computer. Both versions can be access-protected (in different ways but neither safer than the other) and both can be copied and distributed further without the interviewee's knowledge. It may have been the newness of the technology and the fact that it is easier to make unauthorised copies, that made the English interviewees nervous - and maybe the American interviewees were more used to it and so less anxious about it. This and the second point Leonard makes, that video clips can give a false impression of the person concerned (which again should be no different on the PC or a free-standing video) will no doubt concern teachers more as they explore these new uses of VLEs; no other interviewee in this study brought up these points but it is possible that no-one else was using videoed interviews in their course material.

Leonard's second point, that if you cut-and-paste others' work into your own VLE-based material, you could destroy the integrity of their argument (a point which had also been made by Justin, see Box 7-1), applies equally to work copied from more traditional (non-computer-based) teaching material, too – and again, I would suggest that it might be the newness of the technology and the relative ease of copying on a computer, compared with traditional materials, that is principally causing the unease.

7.5 "My bigger concern is plagiarism"

Apart from Justin ("I think plagiarism is a part of learning. I'm not too bothered about that"), almost all the interviewees expressed concerns about student plagiarism, and most seemed to feel that there had been a significant increase in this since students started using the internet extensively. For example, Mathew introduced the matter himself (see Box 7-5 overleaf), at the end of a discussion on an academics' use of each other's work. He expressed

his view that student plagiarism has increased tremendously, sometimes due to confusion over what is, and is not, permitted and sometimes as a deliberate act caused partly, he suggests, by the increased time pressures imposed on modern students.

Box 7-5: Matthew: "It's stealing"

Just on that point, I think the bigger concern I have there is plagiarism. It's the way in which it is quite clear, not just in this or other universities, that there has been a tremendous growth in the use by students of the web. At one point it's natural, although they come close to plagiarism, as I explain it to students. I keep saying "Look, it's in your handbook but let me explain a bit further. Any use of others" material, ideas, or whatever, without appropriate recognition is plagiarism. It's stealing." "Yes but you know I was just..." "Yes, I know it's from a book and so on and so forth but you must go through the process." So there's the, what might be called unwitting plagiarism and the use of it, plus also I think increasingly sometimes, some students, often the weaker students, according to their bibliography, haven't read a book or anything else at all, it's all web stuff. And I've said "No, that isn't ... however good some of these are, you need to engage with the appropriate literature⁶⁰. There is stuff in the course outline that you really ought to have done so I've actually marked this down on that basis because you haven't really given the full ... because after all, who is dah dah dot dot dot html? Do you know? I don't know? So how do you know..?" Whereas in the case of certain books and so on, they have had to go through a case of proper academic checking out and so on and so forth so you've got rather more to rely on. The other point is quite simply, as I'm sure you are aware, is the way in which students conceal the fact that they have taken stuff from the web, and that's, although there are checking mechanisms now of course, and the university, as I understand it, has got some of this software, it is a problem. And as students are increasingly pushed for time, and working and so on and so forth, there is I think a temptation on such occasions. A mixture, you know, sort of drifting from the unwitting and unintentional into the intentional, and to be honest, you know, it can get past you.

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Interestingly, Mathew still has a lingering feeling that on-line text is not "appropriate literature" – which he only partly justifies here by saying that authors of web-based work may not be of known academic standing.

Here, Mathew brings up many points which concerned almost all the interviewees: he recognises that there can be a fine distinction between 'research' and plagiarism; he distinguishes between "unwitting plagiarism" (not really understanding the rules) and deliberate intent to deceive; he expresses unease over quoting from sources that haven't been subjected to the full rigorous checking that is applied to paper-based published works; he shows sympathy for the students tempted to copy because of the pressures of, for example, working as well as studying; and he observes that, although the alert teacher should spot cases of plagiarism, it can sometimes "get past you".

All these points, and more, were reflected in most of the interviews. Even Justin, despite his overall feeling that "plagiarism is a part of learning ⁶¹", accepts that it can lead to a lower standard of learning, of competence ("But I do say to students that they are not being original in their work and there is no good jobs for people who are there if they are just copycats; they have to be original thought"). However, he describes a robust response by the students ("they say 'but we can't, we do work based on somebody else's work because we haven't got time to do so, that's who we are'"). In other words, he hints that some of the problem might be with the system: too much work for the time available or students moving to 'instrumentalism' (working only to get a qualification), rather than seeking deep learning.

7.6 Agreements and contradictions

Attitudes to the three different areas of concern – being copied by others, accidentally copying others' work, and student plagiarism – had different levels of consensus among the interviewees. Almost every interviewee expressed concern about student plagiarism, and most were very worried about it, even if only because (like Justin) they felt the students would be less skilled if they only learnt to copy and not to do original work. However, only about half the interviewees said they were anxious about other people using their work⁶².

For example, Mathew said: "I've never been one that wanted to hang on to the stuff that I've got because I know it's not mine anyway. I've drawn on, to use a

Of the rest, a few said they did not mind being copied and the rest did not mention it at all.

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⁶¹ Like Nigel (Box 7-6), Matthew feels that student plagiarism is inevitable, which I found interesting.

few names at random, I've drawn on Marx, I've drawn on Weber, my quality I think is as an interpreter."

By contrast, when I ask Nigel how he feels about other academics copying his work, he appears ambivalent on the subject (see Box 7-6). First, he shows distaste for the concept ("I would take exception if it happened amongst us") and uses the novel, *Lucky Jim* (in which the eponymous hero is very distressed to find his article published in another's name) to illustrate his point, implying that he (Nigel) would feel the same if it were to happen to him. However, two sentences later, he declares himself quite unperturbed about the whole matter (he gave an unequivocal "No" when I asked "Does it worry you?"). This need not be inconsistent, of course: he could dislike the idea but be unconcerned because (naively, perhaps) he does not imagine it could happen.

Box 7-6: Nigel: "I would take exception if it happened .. amongst us"

Oh you mean IPR. That's, I really think that [plagiarism and IPR] are two substantially unrelated issues. One's about people trying to get, er, at undergraduate level, pinching ideas. That's what you are expecting them to do, at the end of the day⁶³. I would take exception if it happened at, amongst us, that's not good. Do you remember the work "Lucky Jim"? Do you remember what's happening to Lucky Jim most of the time, about the plagiarised ... mm ... he's written this article about British ship building, English ship building, in the late 15 or 1600s and it eventually appears in Portuguese somewhere...

Mmm. Yes. Does it worry you, really?

No.

People always could, it's just easier nowadays, isn't it? You just hope they won't...

Yes. There's another problem. I'm told that there are as many people on the earth today as ever lived up until 1900, and I wouldn't be in the least bit surprised if some of them didn't come up with the same ideas!

Another possible interpretation which would also explain Justin's seeming inconsistency, could be that people feel they **should** support an open approach to the sharing of knowledge, in the finest traditions of academia, but that practical concerns ("how are the poor writers going to sustain their

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⁶³ An interesting remark which I might have pursued, had I not been afraid of distracting him at this point.

families?") and baser feelings ("I think that's an awful thing, that some people did research for too long to be treated like that") can take over when the interviewee is reflecting on the subject, rather than answering a direct question. This is an important idea because the 'secondary' feelings may then not emerge in response to simple questions or questionnaires, so an incorrect impression could be fostered that this is not a concern (as indeed it would appear at first sight for the other half of my interviewees), when in fact it is.

It should be noted that a few interviewees positively welcomed the idea of their work being used, even without explicit acknowledgement of their contribution. For example, lan volunteered (unprompted in any way by me), the very clear description of his feelings given in Box 7-7.

Box 7-7: Ian: "If anyone wants to use it, then fine!"

"The web site that I've developed for Development Practice is available publicly on the web and I've recently had an article accepted for publication, which I prepared with one of the Research Assistants here, about the use of that web site. My view is, if there's any other similar department out there in the country, indeed if there's one anywhere else in the world, that wants to use that project brief and all the material that goes with it, then fine! What would be nice would be, if people then got in touch with me and said 'Well, actually, we've used the material and found it a useful resource'"

However even he, while not looking for public recognition of his work, comments that some appreciation would be nice, even if it was just a private response of "it was useful". This seems to me to be more a question of good manners than of property protection, and prompts me to think about the whole question of 'web-manners'. It would appear that codes of acceptable conduct for those using the web are gradually developing, an example being the convention that over-use of upper case in e-mails is the equivalent to shouting and therefore impolite. However, such codes of conduct are still relatively narrow and not very well known. One might feel that most of the users of these technologies are immature users, that the immature (that is, children and adolescents) can be ill-mannered, and that with maturity (in web use) a

framework of good manners will come which will serve to make the experience more 'civilised' for all.

The third area of concern (accidentally copying other people's work) also evoked mixed reactions: a few people saying they were very concerned about it, many that they were not concerned, and the rest not mentioning it at all. For example: Percy definitely felt that work put on the web was open to be used by others, as shown in the excerpt given in Box 7-8.

Box 7-8: Percy: "The default position is that it is available for you to use"

Yes, I think that my, I might be legally wrong in this because I know the law changes all the time, but it's always been the case that the internet has been an open medium and that whatever you put there, if you put it there, then so long as you don't actually put a statement there saying "I own copyright of this, you must not use it", the default position, if you like, is that it is available for you to use. And that's the way it's always been. But I think, you know, people would respect, if people did put something on there and said on it "I ..." (whatever form of words they use to say 'do not copy this') then they'd respect that. You know, unless it says that, you assume it's OK to use it.

It's just that some people seem to be very concerned about it (and probably it depends on your subject matter, really) and some people say "well, either way, people should use it, information is an open resource".

Yes, I think sometimes people might be, thinking they might put the material together for a book, and then publish it. But then if you did that, then, again it's up to you, isn't it? You don't have to put the material available on the net if you don't want it to be available. So I think really people have got to manage that themselves.

I wondered what might cause these variations in opinion and that a clue to this might lie in Mathew's remark, when explaining that he was not concerned if others used his work: "my quality, I think, is as an interpreter". It would appear that he did not base his sense of self-worth (his academic identity) on his knowledge of the subject area which he taught so much as on his ability to help his students understand and learn about the subject concerned – that is, he saw himself as a *teacher*, rather than a 'subject matter expert'. Quentin seems to be making a similar point in the interchange shown in Box 7-9 overleaf.

Quentin had explained that he was teaching in a very different area from that of his doctorate and post-doctoral research, and hence (a) he did not feel proprietary about others quoting his work, even without acknowledging his contribution but (b) he made extensive use of others' work, and was very concerned about only using it appropriately. Thus, it would seem that the different attitudes over intellectual property rights and academic plagiarism might stem from academics' different perceptions of self – as a teacher (even, an interpreter) or a recognised expert in their field.

Box 7-9: Quentin: "I'm just working with students to interpret the resources"

In terms of intellectual property, I'm so far removed from my original subject base, I'm so used now to having to look for resources, so I'm really just using other resources and putting it together into a learning package, and so I suppose I've gone to a different style, so I'm no longer a person who uses my own subject knowledge because my post-doctorate doesn't relate to the courses I teach, I'm afraid. (I have tried to bring it in but it hasn't fitted in!) So I'm so used to working, I suppose I work in a different way. So I don't necessarily see much of what I do as originally all mine; it's just I am working with the students to interpret the resources there are.

And are you comfortable with that?

Yes.

There's two sides to it; whether anybody uses your stuff, which you were explaining you're not bothered about, and whether you are properly or improperly using other people's stuff...

Yes, there are, as you say, the two sides and I'm being very careful about the improper use...

Henkel 2000 locates academics on a "spectrum that extends from those who might be called 'idealists' to 'pragmatists'." She describes (*ibid*:150) the former as "those whose working lives centre on commitment to a discipline" and the latter as "those for whom membership of the academic profession ... has a higher profile". Among the pragmatists she includes (*ibid*:177) those who give prime emphasis to teaching rather than research in their chosen discipline, describing this as "instrumental", in that they focus on teaching because that is a way of obtaining or keeping their job. The idealists, in contrast, are those

who are interested in developing and disseminating knowledge in a chosen field. It seems likely to me that Henkel's pragmatists might be less concerned about their eLT-based work being used, unattributed, by other academics because their prime focus is on being a good teacher, to which aim the quality of published work is somewhat incidental. By contrast, academics who derive their sense of identity or self-worth from being preeminent scholars in their field may be more affected by others rivalling their eminence by 'stealing' their work.

7.7 What does 'owning' knowledge mean?

Introduction

I began this chapter by considering the question, underlying the whole discussion of plagiarism and intellectual property rights, of what 'owning' work really means. I concluded that what is being 'owned' is not the *actual* thoughts, ideas, and so on (here called "knowledge", for brevity) but rather the *expression* of that knowledge, in text, pictures, speech, web-images or similar (here called "text", for the same reason). This was my own attempt, before the interviews, to understand knowledge ownership. After analysing the transcripts and finding plagiarism and IPR to be of significant concern to my interviewees, I looked into what others had said on this score, as described in this section

I found that much thought and effort has been expended, over the centuries, on considering the exact meaning of "knowledge", in an effort to explain what it really is, but that recent thinking has tended to discount this effort as pointless. For example, Wittgenstein 1968:3 wrote "But what is the meaning of the word "five"? – No such thing was in question here, only how the word "five" is used" and "One knows the meaning of a word when one knows how to use it" (quoted in Waismann 1967:237). That is, he holds it to be better to consider how we *use* a word than to try and think about what it "means". In the current discussion, this would translate into a need to understand how we use the term "knowledge" before we can consider who has the rights of its ownership.

Since Wittgenstein and Waismann, the whole notion of intellectual property rights (and hence plagiarism) has been challenged by the ideas of those such as Derrida and Barthes who argue against the independent existence of something called "knowledge" at all. For example, Barthes 1975 uses his analysis of Balzac's story Sarrasine to illustrate his claim that there is no such thing as an independent truth or story (the "signified") related by a text or narrative (the "signifier") and any individual signifier/signified combination has a multiplicity of meanings. That is, any text can and does signify many different things - possibly changing each time it is read because of the active participation of the reader in 'rewriting' it. Howarth 1975:iv explains: "[Barthes'] researches into the structure of narrative have granted him a conviction ... that all telling modifies what is being told, so that what the linguist calls the message is a parameter of its performance. Indeed, his conviction of reading is that what is told is always the telling". Similarly, Barthes himself says (ibid:213) "This fable teaches us that narration (object) modifies narration (action): the message is parametrically linked with its performance; there is no question of an utterance on the one hand and on the other its uttering. ... Ultimately, the narrative has no object: the narrative concerns only itself: the narrative tells itself." (Barthes' own emphasis).

These theorists then agree with the conclusion I reached in Section 7.1: that academics' concern over plagiarism (by themselves, their peers or their students) is misplaced because there is no such thing as an independent 'knowledge object', capable of being owned or stolen, there is only a transitory telling ('signifying') which becomes a new 'signified' every time the text is reread or retold. It follows that knowledge which someone thinks they 'own' changes when it is repeated, or even read, by someone else, so it is no longer the same knowledge and cannot have been 'stolen'.⁶⁴

This position is both logical and useful – for example, when one is encouraging the sharing of knowledge between academics or promoting unfettered research by students – but it does not solve the prime concern which academics have about student plagiarism – that the student will not achieve deep, quality learning by copying the work of others. This concern has a long history. For example, Laurie 1880:65 quotes the 16th century educationalist, Montaigne, as follows: "If we were to put in the shortest form Montaigne's idea

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It is also difficult to understand how someone else could "steal" it, when the original owner still has it (in their head, if not on their web site or VLE) after the "theft.

of the end of education, we should say that it is this: that a man be trained up to the use of his own reason. 'A man' he says 'can never be wise save by his own wisdom' ... Knowledge will not 'find a man eyes; its business is to guide, govern and direct his steps, provided he have sound feet and straight legs to go on' " (Laurie's, and possibly Montaigne's, own emphasis). In other words, it is not enough to copy another's work, even if Barthes is right and this copying results in a new 'signified', because this is not the way for the student to become wise, which is the purpose of education. Compayré 1908:66 similarly quotes Montaigne as saying: "Learn to think freely, and not to follow lamely on the trail of another" and: "Tis a sign of crudity and indigestion', he⁶⁵ says, 'to vomit up what we eat in the same condition as it was swallowed down' "(ibid:70).

How to become an owner

If we put the ideas of Barthes et al on hold for the time being and maintain, for the sake of argument, that there may be something (called, say, "knowledge") separate from the reading or telling of it, which one could own – the question still remains: how did the knowledge's ownership become vested in the person who is claiming intellectual property rights over it? Plato (1910:90-91) said "The soul, then, ... there is nothing of which she has not gained the knowledge. ... For inquiry and learning is reminiscence. ... all our knowledge is reminiscence". That is, he held that all knowledge is acquired before birth (in a previous life) and that the process of 'learning' is merely the 'recollecting' of this knowledge⁶⁶ which leads us to an interesting dilemma. On the one hand, if Plato's theory is correct, knowledge cannot be stolen because the 'thief' had it all the time, from a previous life. On the other hand, if knowledge did not preexist in this Platonic sense, was it constructed from its 'original' owner's reading, experience, discussions and so on? If so, this 'knowledge-owner' would be transgressing the intellectual property rights of all those whose ideas stimulated and informed his knowledge – the writers of the books he had read, those with whom he had discussed ideas, and those who had in any way

That is, Montaigne

This would of course apply equally to the one who purportedly steals as well as the one from whom the knowledge may have been stolen.

participated in his experiences. He would be as guilty of plagiarism as anyone who quoted his work.

If, to return to Barthes, one holds that what can be 'owned' is merely the particular textual representation of the associated knowledge, it would appear to follow that, provided the text is recast even slightly, ownership rights have not been infringed. But this trivialises the whole problem and is not in the spirit of the way those concerned with intellectual property rights look at the issue. Stefani and Carroll 2001:4 discuss the difficulties of defining plagiarism and offer several definitions which include an element of "intent to deceive or gain advantage". For example (ibid) "Plagiarism is the verbatim use of another's work as if it is the student's own work. If students take the writing of a published author and present it as their own⁶⁷, this constitutes plagiarism. Sometimes this is done unintentionally because of poor research habits; sometimes it is quite deliberate. In either case, plagiarism is unacceptable". If we omit "verbatim" (otherwise a slight change of text would suffice to avoid the transgression) and substitute "you" and "your" is for "the student" and "their", this becomes a useful definition which: covers academic, as well as student, plagiarism; addresses "inadvertent plagiarism" (attributed to poor research habits, so still unacceptable); and avoids the questions with which Barthes et al were concerned by concentrating on the 'intent to deceive' and/or 'poor research habits' as the fault, rather than the "stealing" (which may not be possible) of some "knowledge" (which may or may not exist, and may or not belong to anyone else), all of which may or may not be an educationally useful thing to do.

7.8 Summary

In summary, it appears that the whole issue of plagiarism, and intellectual property rights, is confused. This has been well researched and discussed with regard to *students*' attitudes to plagiarism, for example by Ashworth, Bannister & Thorne 1997 who report similar problems to those discussed here: people's notion of plagiarism is very unclear, some fear they may plagiarise unwittingly, some blame the system or HEI managers for some of the problems, and so on.

67 My emphasis

However, little similar research seems to have been done with regard to teachers' attitudes to plagiarism, especially not regarding plagiarism by their peers.

In particular, the following are not clear: to what, exactly, intellectual property rights might reasonably refer (what is being or can be 'owned'); how rights to any knowledge might be reasonably obtained; whether, if a person claims such rights, they must necessarily have transgressed the rights of others to obtain the knowledge they are now guarding; how someone can 'steal' someone else's knowledge when the other person still has it; and how similar the knowledge a second person has must be to that of a first person for it to be established that plagiarism has occurred.

What is clear, however, is that this is a subject that troubles academics at least as much as it does students and that the introduction of eLT is perceived to have exacerbated both the problem itself and teachers' concerns about it.

7.9 Reflections

7.9.1 Is this new?

Regardless of the confusion surrounding the whole issue, the fact still remains that the teachers whom I interviewed were concerned about intellectual property rights and plagiarism. However, one might ask whether this concern is actually caused by the introduction of the new technology. My view is that such concerns have probably always been part of academic life but it is likely that the introduction of the technology has exacerbated them. Certainly, the interviewees seemed to think this was the case, especially where student plagiarism is concerned. Mathew said "it's quite clear, that there has been a tremendous growth in the use by students of the web. ... So there's the, what might be called unwitting plagiarism and the use of it, plus also I think increasingly, sometimes some students, often the weaker students, according to their bibliography, haven't read a book or anything else at all, it's all web stuff" and Nigel said "as compared to the time before the web existed, ... I understand there is a lot more plagiarism. And I also found out it's more difficult to detect".

Many of the interviewees acknowledged that they didn't actually know to what extent plagiarism had increased since the introduction of the web but they were certain, from their experience, that it had increased substantially. And, like Nigel, many also mentioned that they thought it was becoming increasingly difficult to detect plagiarised material⁶⁸, so the problem might be even worse than they were thinking. And indeed, all this seems very likely. Each step along the technology path has made plagiarism easier - it must have been very laborious to search libraries of books to find suitable passages to insert in one's own work, then copy the text by hand and rewrite the passage into one's own manuscript. The advent of the typewriter, the photocopier and the word processor must have made the copying considerably easier but the search and the retyping would still have been hard work. Nowadays, search engines can guide an author (student or academic) directly to a suitable passage which can be incorporated in toto in the author's own work by means of only a few mouse-clicks. So much easier than thinking up, and typing out, the text oneself - no wonder it is tempting! And with the text editing facilities which are now integral to all word-processors, it's not even difficult to disguise the plagiarised text so as to pass it off as one's own.

It is worth noting that it is not easy to decide at what point (for example, after how much paraphrasing) a text becomes a new text, and not a plagiarised one. Barthes would hold that it becomes new when it is re-read, Montaigne that it must first be judged (as true or false, in agreement or contradictory to other texts, and so on) and plagiarism-detection software only requires a certain number of textural changes before it is called "new".

If there has been a marked increase in plagiarism, as most of the interviewees thought, and as plagiarism is undoubtedly made easier by modern information technology, the root cause of the increase might be the technology advances which HE is employing so widely. However, another contributory cause, apart from the *means* of doing it, could be the *need* to do it. As has been widely discussed, the pressures on students and university teachers in the UK have significantly increased in recent years. It has been claimed that the increase in the proportion of the population entering higher education and the increased

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⁶⁸ This was before the widespread use of detection packages such as *Turnitin*, as mention in Chapter 3.

financial contribution expected from students have led to some side effects: a degree of instrumentalism not apparent when only a privileged few went to university, and were funded by the state or their parents; a large number of students working at the same time as studying (for example, to fund their studies); and increased pressure to get high grades (class of degree could be the differentiator when over half of job applicants have been to university). These factors lead to some students having less time and energy and/or feeling the need to get very high marks, so shortcuts, especially those which raise the apparent quality of the student's work, become very attractive. That is, the higher number of students, and their greater financial pressures, coupled with a less buoyant economy than was experienced in the UK in the second half of the twentieth century, may be another contributory factor to increases in plagiarism.

Students are not the only ones affected by government changes in Higher Education policy: teachers, too, are under greater pressure than hitherto. It has been found (Sikes 2005 & 2006) that the changes regarding tenure, including increased use of short-term contracts under which many academics now have no job security, reductions in government funding for universities, leading to larger teaching loads, and increased requirement for teachers to help raise their departments' research profiles to attract research funding, have all led to increased pressure on academics. Furthermore, the relative decline in university teachers' salaries compared with those of many other professionals, plus a potential decline in respect commanded by academics in a world which appears to judge people's worth principally by financial yardsticks, may have caused teachers to place a significantly increased emphasis on the importance of peer respect, which (they may perceive) is only to be gained through demonstration of their special, perhaps unique, knowledge in a their chosen field.

So, as with students, while eLT has made plagiarism easier, the increased pressures on academics may have made it more tempting; and once again, it is likely that both of these are contributory factors.

7.9.2 A market in 'courseware'

In the last section, I reflected on whether the increased use of eLT was actually the cause of the apparent rise in plagiarism/copyright infringement and concluded that, while it may not have been the sole cause, it is likely to have been a significant contributory factor. A further way in which the new technology has without doubt contributed to what some of my interviewees viewed as an unreasonable infringement of their intellectual property rights is the potential for universities to buy and sell VLE content and off-the-shelf courses ('courseware'). Only one of my interviewees (Brigit) had had direct experience of this phenomenon but many of the others speculated about it, particularly because it was the planned approach of the embryonic e-university with which North University was closely involved at the time of the interviews⁶⁹. All who discussed it felt that a market in courses was a new thing which had been directly generated by the advent of VLEs; that while universities could, in theory, have bought and sold courses, or components of them, before, it was only since it had become so easy to add bought-in content to an existing VLE course that this had become a practical proposition.

Newmarch 2000 and Noble 2002a's concerns on this score were briefly mentioned in Chapter 3. Noble, in particular, claims that the "commoditization" of instruction causes university teachers to be "drawn into a production process designed for the efficient creation of instructional commodities, and hence become subject to all the pressures that have befallen production workers in other industries undergoing rapid technological transformation from above" (*ibid*:6). He goes on to describe the consequences he foresees.

Once faculty put their course material online, moreover, the knowledge and course design skill embodied in that material is taken out of their possession, transferred to the machinery and placed in the hands of the administration. The administration is now in a position to hire less skilled,

⁶⁹ The e-university initiative has since failed, but this was not expected at the time of the interviews.

and hence cheaper, workers to deliver the technologically pre-packaged course. It also allows the administration, which claims ownership of this commodity, to peddle the course elsewhere without the original designer's involvement or even knowledge, much less financial interest. The buyers of this packaged commodity, meanwhile, other academic institutions, are able thereby to contract out, and hence outsource the work of their own employees and thus reduce their reliance upon their in-house teaching staff.

Most important, once the faculty converts its courses to courseware, their services are no longer in the long run required. They become redundant and when they leave, their work remains behind. ... Some skeptical faculty insist that what they do cannot possibly be automated and they are right. But it will be automated anyway, whatever the loss in educational quality. Because education, again, is not what all this is about; it's about making money. In short, the new technology of education, like the automation of other industries, robs faculty of their knowledge and skills, their control over their working lives, the product of their labour and, ultimately, their means of livelihood."

In summary, he claims that due to this commoditization:

- Faculty are in the same position as skilled workers of old who were controlled, made to work harder and ultimately replaced, by technology
- The motivation is not better education provision, it's simply financial; the
 objective is only to enable HEIs to sell more 'product' at less cost and
 thereby increase their profits (as with the first industrial revolution).

A dire prediction, indeed, and one that is slightly reflected in my interviews. Brigit's displeasure that a course of hers had been "commoditized" was mentioned earlier and Roger said, in answer to the question "How would you feel about the university selling your VLE content?: "Not very comfortable, to be honest. I suppose I feel that it's my stuff and they shouldn't be able to sell it, not without me benefiting, or even having any say in the matter". However, few of the other academics that I interviewed seemed particularly perturbed by the prospects envisaged by Noble and Newmarch and I wondered why this might be. Further analysis of my transcripts suggested that this was probably not because they didn't *mind* it happening – Roger, for example, makes this very clear (Box 7-10) – but rather because they didn't *believe* it would happen.

Box 7-10: Roger: "I wouldn't like that, at all!"

Can't you buy VLE courses 'ready-made'?

Not on my salary! But I suppose the university could. I don't really see it happening, though. Our courses are too specialised, I think.

But isn't there a bit of a trend to standardise things? You know, like in schools?

God forbid! I certainly don't relish the idea of all courses being the same, even if they are very good ones. Of course, if we went in that direction, in the end, in the ultimate, I suppose they could buy in all the courses and just have a few teachers to supervise them – or even get the PhD students to do it – well, I wouldn't like that, at all, I can tell you! I'd be off, that's for sure!

But it would still need people to prepare the courses, and mark the students' work and...

Not many ... and what a job! Not for me, I'm afraid

Maybe English academics are more self confident, or blind to the danger, than their US and Australian peers (or, at least, than Noble and Newmarch had expected them to be). Or maybe they feel that time has shown that such fears are unjustified 70. Noble's predictions were first made in 1997 and by the following year he was already saying (*ibid* III:1) "the juggernaut of on-line education appears to have stalled". However, he didn't retract his predictions (the juggernaut had only stalled, not crashed), he simply reported that eLT's take-up did not appear to be happening as quickly as expected, and others have expressed the same fears since (though not to any significant degree in the UK) so the reasons for my interviewees' different reactions remain unclear.

Whatever the cause, however, the opinion of the majority of my interviewees can be summed up by Quentin's response (Box 7-11) when the subject of technology's impact on job security was mentioned: he was absolutely sure that the teacher's presence was an essential element of a quality teaching and learning process.

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However, one might think that, in the reported words of Chou En Lai when asked whether he considered the French revolution had been a success, "it's too early to tell".

Box 7-11: Quentin: "If you remove me, the quality of the experience goes down"

"A computer's **never** going to [replace me]! My role is to enable the students to, I've got to put the material together, and enable them to take the path through the material, and the technology's purely a tool. Now you could argue that once I've done it once, then that material is there, but it's all about the dialogue, with me, with the material, that happens; so if you remove me from the equation, I think the quality of the experience goes down dramatically".

7.9.3 Is this just another power issue?

The general issue of knowledge ownership and related concerns of plagiarism, IPR, the possibility of universities trading in VLE content and so on could perhaps be just normal human power struggles. "Knowledge is power" is commonly claimed⁷¹ in the business world, and I see no reason why the same should not applies in academia. It is not unreasonable for academics to feel more secure in their jobs, in the respect of their colleagues, and their status with their students, if they have special knowledge, which is not widely known by others and is required (by the HEI and their students, at least) to be taught by them. The way in which some of my interviewees were generally uncomfortable about their work being copied by others, without being able to justify these feelings clearly, would be compatible with a feeling that their power or authority is being eroded – most people do not like to admit to any degree of need for power and status and would not be comfortable with such feelings. And plagiarism - or at least, un-attributed copying, by students or other academics - while not very different from researchers drawing on a range of sources, may be seen as a threat to an academics' role as a sages in relation to their pupils, colleagues and even their employers.

7.9.5 Summary of conclusions

In summary, I have concluded from this part of my research that there was a significant level of concern among my interviewees about knowledge ownership, and hence plagiarism (by students, other academics and even by

themselves). Furthermore, there was clearly some confusion, contradiction and ambivalence in their attitudes. For example:

- A fair number of interviewees maintained they were not concerned (for example, about their own work being copied by others) but seemed to show, by subsequent remarks, that they were.
- Many readily admitted that they were confused over what constituted plagiarism – or at least, improper academic practice – for both students and teachers.
- None seemed to feel that their job satisfaction or security was threatened by the advent of eLT, unlike some subjects of research in the US and Australia.

In order to understand these contradictions and confusions better, I returned to the concept of 'owning' knowledge – what knowledge is and whether it can be owned. After considering various ancient and modern views of "knowing", I concluded that philosophical views such as Plato's and Barthes' (that all knowledge is, respectively, either already known to everyone or recreated anew each time it is read or heard) do imply that intellectual property rights and plagiarism are hollow concepts but that this is not a very useful approach when one is trying to promote deep learning or encourage academic research. Instead, I see Montaigne's belief (that the purpose of education is to help a student become *wise*, which cannot happen if the student simply copies other people's work) as more helpful in the debate over plagiarism. This led me to conclude that it is both meaningful and appropriate for academics to be concerned about a possible increase in student plagiarism, possibly caused by the increased use of educational technology.

Similarly, whether or not, philosophically speaking, knowledge is already known (or newly recreated) when copied by an academic, unattributed copying can harm academics' sense of self-worth, as well as their ability to judge the work of others (which is an essential element of *their* journeys towards wisdom) and is therefore a right and proper subject of their concern, too. However, I do think that various well-respected theories, ancient and modern, about the

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A Google search on the phrase produced over 11 million references.

nature of knowledge, strong academic ideals regarding the *sharing* of knowledge, and a confidence in the UK Higher Education community's good sense concerning the *dissemination* of knowledge, may have all contributed to the contradictions I observed in my interviews.

One further conclusion is that, while ownership issues have always bothered knowledge workers, the introduction of eLT has substantially exacerbated the problem (because it makes it so much easier to plagiarise, for example, and to use 'canned' course material) so that current concerns might reasonably be considered to be a product of our times. I therefore argue that the introduction of educational technologies such as VLEs should be considered one of the prime causes of the current concerns and problems in academia about the ownership and copying of knowledge.

8 Theme 3: Privacy

Another issue that has exercised the minds of a number of researchers (for example, Campbell & Condor 1987, Robins & Webster 1987, Ford 1998, Moran & Hawisher 1998, Zuboff 1998, Schwartz 1999, Land & Bayne 2002, Jones 2005 and Luck 2010) is that of privacy, for teacher and for student, in an on-line environment. On either side of privacy are two particular issues: on the one side, *surveillance* (usually called "monitoring" when one is contemplating its benevolent face) and on the other side *secrecy and subterfuge*. These issues are explored in this chapter, with reference to Foucault 1977, Bayne 2005, Land 2005 and others.

8.1 Privacy was not a burning issue

Possibly my most significant observation relating to this group of teachers' attitudes to privacy and surveillance was that almost none of the interviewees introduced the topic, entirely unprompted, by themselves. I had expected that they would, if only because the newspapers at the time were full of articles about human rights and privacy. The Data Protection Act, identity cards, covert surveillance of telephone calls, people's rights to read information held on file about themselves, unauthorised photographs of a recent society wedding – all these and more were issues in the press and on the radio at the time of these interviews. Additionally, a number of books and papers (for example, Noble 2002 and Land & Bayne 2002) had been presented or published not long before the period during which the interviews took place and some universities were starting to compile guidelines for their staff about the implications for HEIs of the Data Protection Act. However, the teachers I interviewed certainly did not have the issue of privacy in the forefront of their minds and some looked very surprised when asked whether it was a matter of concern for them.

However, because one very interesting discussion about privacy and surveillance did occur in my early interviews, I deliberately asked later interviewees whether these matters were a concern for them or not. Roger's response (see Box 8-1) is a good example of the type of dialogue which developed with teachers who had initially expressed the view that privacy was

not one of their concerns. He modified his initial, instinctive responses (that he had no concerns about privacy, he did tell students they were monitored, and he didn't mind being monitored himself) soon after declaring them, reflecting that he'd not actually thought about the issue, he might *not* have told students they were being monitored and he would *not* actually like to be monitored himself. His final position seemed to be that it was perfectly acceptable for *him* to monitor the *students* but not for his managers to monitor him, an apparent inconsistency which was not unusual among my interviewees.

Box 8-1: Roger: "I've never really thought about it, to be honest!"

Q: Do you have thoughts about privacy when you are on-line?

How do you mean?

Well, about using the VLE to monitor students, without them knowing perhaps, or of the staff monitoring you?

No! ... (pause for thought) ... Well, I've never really thought about it, to be honest. Me monitoring the students? Well, that's fair enough. We do, I do do that. I mean, I check to see if they've accessed the material I've put up for them to work off, sometimes, to see if they've even logged on at all, but that's just to see how they are doing, like walking round the class on an old-fashioned classroom, and looking over their shoulders, to see if they've started writing when you've told them to!

Do they know you do that?

Yes. (pause) Well, I suppose they do. I'm not sure I've actually spelled it out for them – I think I have but I'm not sure. I suppose I should do, shouldn't I? With all this stuff about protecting the rights of the individual. But it's just to see if they are struggling, having problems, there's nothing sinister about it

What about the other way round, your managers monitoring you?

Do they do that? Why on earth would they want to do that?

Well, perhaps to see if you are 'falling behind'. Or to see what you are teaching.

Well, they're welcome to do that because I **am** using it!... (pause for thought)} ... But as a general principle, I don't think I'd be very keen on it, to be honest with you. I mean, it'd be a bit 'Big Brother-ish', wouldn't it? I mean, teachers have always been trusted, in the past, to teach in a good way, and to teach good stuff, so it'd mean they weren't trusting us any more, wouldn't it? Perhaps they don't! I don't know.

8.2 The issues

When starting my analysis, I felt that there might be two main groups of issues relating to privacy which could concern teachers: the privacy of *teachers* and that of their *students*. Within these categories, I came to the conclusion that there were at least six sets of issues which might face teachers using VLEs or other educational technology. These were: their students' privacy from *teachers* and from *outside bodies* (such as sexual predators); teachers' own privacy from their *managers*, from their *students*, and from *outside bodies* (such as a government agency or the press); and students' or teachers' ability to create, distort or even falsify their *web-identities*. I therefore asked very general questions about "privacy issues" and looked out for responses related to any of these categories, and any other categories that might emerge.

When I had finished the analysis, I had indeed found all of the above topics in the transcripts. Although few of the interviewees initially volunteered opinions on these areas without a gentle prompt from me (the discussions mostly arose out of a very generalised question from me on the subject) I still felt justified at including them as themes because the interviewees' views, after the first 'prompt', did appear to be natural and spontaneous, not forced by my question, and their comments did seem to generate valuable insights into the teachers' response to the technology. I have, however, shown in the examples in this chapter the specific questions I asked, when quoting the interviewees' responses.

8.3 Teachers monitoring students

Like Roger, most of the teachers I interviewed did in fact use the eLT's monitoring facilities to check on student progress. Percy was a typical example (see Box 8-2). He had said that he used the monitoring facilities to find out if and when his students logged on to the VLE, which modules they visited, how much time they spent at a session and so on, and this provided a convenient way for me to introduce the topic of surveillance. When I asked whether he asked the students' permission, he replied with an unequivocal (and quite forceful) "No!"

Box 8-2: Percy: "I suppose I should [warn them] shouldn't I?"

Q: Um, you said that you keep a track of when they log on and things, do you tell them that you are doing that? Ask them whether it's all right?

Well, I suppose I should, shouldn't I? No!

I don't know. It's just that some people think that that's sort of surveillance ...

Well I suppose so. But I mean it's not, it's not for any, well I suppose anyone could say that, couldn't they? But it's really not for any nefarious purpose. I keep a log of successful log-ins and unsuccessful log-ins. Because often they forget their password and if somebody has tried a few times unsuccessfully to log in I can see who's trying to log in and what they are doing wrong and I can e-mail them you know with the answer. As far as the log ins go it's just, basically it's just for interest. You know, to see who's logging in, and when, and where they're logging in from.

Yes, I can see where it could be very useful and I can see ...

Yes. The Data Protection Act, I'm not sure if it would cover things like that but I think we are aware of the potential problems by as you say, sort of keeping track of people without their knowledge.

... (some discussion here about teachers being monitoring and whether he'd object) ...

I think the general answer to all those sorts of questions is, it's OK so long as you ... ask their permission. Of course, if I believe that's right, then I should have said this to the students! It's a good point that you've made and I should let them know.

I don't suppose they mind at all!

No, I don't suppose they mind because all I'm doing is recording the times and where from, but you are right, you are right.

It seemed that teachers like Percy might be using the surveillance facilities of the VLE without much thought of the moral issues involved. Furthermore, it was frequently only when these were pointed out and contrasted with the teachers' own feelings about being monitored, as in the example shown in Box 8-1 above, that some of the interviewees recognised it might be appropriate to warn the students that their behaviour was being monitored in this way.

Although she didn't bring the subject up herself, one of the early interviewees (Brigit) clearly *had* thought about the issue, and she referred (Box 8-3) to a situation at her university where the students had refused to participate in a scheme to monitor their use of the VLE.

Box 8-3: Brigit: "I'd like to think ... monitoring activities will not really take off" Q:and what do you think about that [surveillance]

There was one incident I remember about some students at this university.Part of their course was being taught via a VLE, and students were told that they were going to be monitored, and I don't know whether they were actually going to be credited with the amount of time they spent on-line. Anyway, the upshot was that they absolutely refused to participate if they were going to be monitored; they said 'you don't follow us around the library, when we check out books, and see how long we spend and what shelves we go to. This is ridiculous we won't do it.' And so they didn't do it and I felt, well, good! And so I'd like to think that these sorts of monitoring activities will not really take off, will not be used in any real sense. But it's hard to know — I mean, the worry is the fact that it exists at all, it's not just talk — it's always a possibility, such things."

In this case, Brigit was not only very aware of the issue, she was opposed to the spread of monitoring and pleased that the students had resisted it. Other interviewees who were at the same university as Brigit also expressed concerns about privacy so it is possible that there was more awareness there – maybe because of the student action described by her – than at the other university whose teachers I talked with.

Only one teacher (Matthew) introduced the subject himself, virtually unprompted 72, and he also brought up the matter of whether the students might object (see Box 8-4). Unlike his colleagues, he was sufficiently concerned with the issue to think of bringing the matter up with me ("I was going to mention that earlier on") and he was definitely surprised and concerned (his voice in the recording shows this) that the students didn't seem to have any objections, even after he had suggested that the monitoring might affect their marks in the future. He finally tries to generate a reaction by illustrating his ability to 'snoop' through mentioning, and teasing, one student who had been working on a Sunday but still apparently failed to stimulate the students' interest in the subject.

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He had included "monitoring facilities" a few minutes earlier when listing interesting features of the VLE, and I simply returned to that, as shown in Box 8.4.

Box 8-4: Matthew: "It didn't bother them! It really didn't!"

Q: On the monitoring thing, what you said just reminded me, do <u>you</u> use the monitoring facilities in the VLE?

Yea.

In what ways?

Funnily enough, I was going to mention that earlier on. Er, ... we don't use it a lot, but just out of fun, really, more than anything else, I suppose initially, we started to look to see, there was a test, that's right, there was a little test ... and they were given a sort of little quiz on it and my colleague ... had set this up so there were multiple, you know, each time you went into it the questions were slightly different, or the mix was different anyway. And so he was using it to check it out. And he was also set up, using the seminar groups actually, to get them to work out their own particular form of learning style. So he had set them some stuff on that as well. Well we were just looking, ... and I did it with one of my other groups, because they are totally unaware of this, the students, they've got **no** idea that you can actually look on there and find out when they accessed it, down to the individual student, and I said to them "Does this worry you?" and one or two of them said "Don't know, really". I said "Well, does it worry you that, I mean all I can find out is when you accessed the web, which particular bits of the course you looked at and how often? We're not talking about any marks or anything as yet although we might do that in the future, because the system allows that. Does it bother you?" It didn't. It didn't actually ... You know I sort of camped it up a bit and said that "Of course there's somebody here that was looking at this at 3 o'clock on a Sunday afternoon – for goodness sake, get a life!" and they looked around, she knew who it was, I didn't look at her and you could see her redden up. I said to her afterwards, "I knew it was you, and you knew it was, I'm sorry I wasn't having a go"...

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"One of the things I do want to be able to do is to check out whether the students are doing what we think they should be doing at a particular time, because this will feed back into us then saying 'By the way, a number of you don't seem to have looked at such and such yet — I'm not going to mention any names — but I really do think you ought to have a look at that stuff because until you've looked at that stuff, you can't really understand this stuff"

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"I could try to check whether they've <u>read</u> what they're supposed to, of course, and I don't. ... But then, how do I know whether or not a student [is telling the truth], if they've told me they've read a chapter of a book? At least I'd <u>know</u> [with a VLE]."

Clearly (from the second quote above), he'd like to develop his use of the monitoring facilities but does not, at least in this interview, consider employing a more formal way of soliciting students' permission to be monitored. He does, however, contrast his interest in monitoring the students' use of the VLE with his lack of interest (and ability) to monitor their use of recommended text books (the third quotation). In this, he acknowledges a crucial aspect of the changes introduced by educational technology: it is not that the technology allows people to do things that were not previously possible (universities could always have monitored students' visits to the library, had they really wished to do so), it just makes it easier to do such things. Not only easier, but almost expected ("the facilities are there to be used, so I suppose we should use them" mused one interviewee) and certainly less obviously abhorrent. Both teachers and pupils would certainly have objected to physical surveillance devices (cameras and listening equipment) being used to monitor their activities in the library, but monitoring through the VLE seems quite benign and has apparently raised relatively few hackles (so far).

Finally, a quite different facet of student privacy was mentioned by Adam, this time as a real benefit of the technology (Box 8-5).

Box 8-5: Adam: "But it's also quite private and discrete"

Q: Is there anything else you feel about the VLE?

".....But it's also quite private and discrete; when you work in a shared office there are a lot of matters which I couldn't discuss with the student because of issues of confidentiality or privacy or because it's of a personal nature. I wouldn't feel comfortable with discussing it in a shared office but it doesn't matter what you type in an e-mail so long as it's readable and only they are going to read it, so there is that sort of sense of privacy there"..

In these days of shared office space, it can be difficult for a student and their teacher to be able to converse privately, at least without drawing attention to the fact that they are doing so, this could certainly be a useful facet of the technology. However, one might also reflect that this sense of privacy and security can prove false. For example, another interviewee told how he had

worked through copious files of old e-mails from a student to his various teachers to check on the former's claim of 'special cause' for a poor exam mark, because of illness and stress during the previous term. These e-mails had presumably been written on the assumption that they would be private to the recipient and used only for the purpose at hand, which turned out not to be the case. Again, other e-mails get forwarded to third parties, or read by others when a machine is left on – Adam's "sense of privacy" may be just that, only a sense, with no substance.

This point did not come up with anyone else, maybe because people sometimes have a tendency to look for concerns, rather than benefits, about/of the technology. However, it is important to record that most of the interviewees were fairly enthusiastic about the tools in general, and most only started bringing up problems <u>after</u> they had extolled the technology's virtues.

8.4 Privacy versus student protection

Another facet of privacy which concerned some of my interviewees was that of student security from malevolent outsiders, such as hackers and peddlers of pornography. Justin (Box 8-6) talked about his concern that chat-rooms, in general, may expose students to the risk of being approached by strangers, with possible ill-intent. He says he will avoid using the chat-room facility provided within the university's VLE for this very reason; he's afraid of exposing the students to possible danger and himself to culpability if any students were harmed in a chat room he had set up within his course. He also makes the point that this is an issue about which the university has provided no guidance to staff and that universities should be more proactive with advice on matters like this, to protect their staff as well as their students.

This is interesting because the VLE vendors make a virtue out of how secure their sites are, claiming that intruders cannot penetrate them, unlike open web sites which could in theory be used instead of a VLE.

Box 8-6 Justin: "I'll try not to touch it until I feel ... it's totally safe"!"

Q: Do you use anything like the on-line chat rooms?

I feel recently, incidents in the countries in the world of people trying to approach other people via the computer ... I wonder if this chat system could open problems for us lecturers, I don't know yet, if we could have difficulties there ... I don't favour it so it's got to be a very closed framework and I won't introduce chat rooms. No. I'll try not to touch it until I feel, I know it's totally safe. And the other thing I must say, I don't think the university gives clear indication what we should or should not do. And I wonder if some of these is already there, available, but should we use them? Like on the web sites, lesurable⁷³ {?} material has always been available but it's only been recently we've been told about the criminal offence. Why weren't we told? I think we've got to act a bit quicker and until, until the university doesn't say so, I'm not prepared to take any action because I don't know if it could have some personal implications.

This supposed security was obviously either unknown about or disbelieved by those of my interviewees who expressed this anxiety. Additionally, Justin's fear was not the only concern expressed in this area. Other interviewees mentioned anxieties over offensive e-mails that had spread around the university, whether originating from internal (presumed student) sources or from outside⁷⁴ and others (such as Matthew: see Box 8-7) speculated on the ethics, and possibility of litigation, related to the university providing students with tools by means of which they so easily could access potentially undesirable material. In all, there was some unease about whether the technology was potentially exposing students to harm, and as a result, leaving teachers at risk of blame, and possibly even of litigation. A couple of my interviewees who discussed this matter attempted to offer 'student protection' as a justification for the university's invasions of students' privacy via the VLE - "Well, we need to keep an eye on what they're doing ... it's for their own good, really ... we need to keep them safe" was a quotation from Justin, when talking about the VLE monitoring facilities although he rather mixed up the monitoring of VLE access and that of e-mails in this discussion.

⁷³ I think he was meaning 'seditious' here

The point was stressed that the university was working hard to stop such abuses occurring.

8.5 Teachers under surveillance

The subject which raised the strongest response in these discussions was the possibility that the VLE may be used by university managers to monitor how and what academics were teaching. In many cases, there was a straightforward disbelief that this might happen, coupled with scorn of anyone who might want to 'snoop' on their teaching; interviewees expressed a "just let them try" attitude, implying monitoring of this sort would be strongly resisted if it were ever seriously suspected. Others said they trusted the university not to misuse the data on teacher activity to which it undoubtedly had access, or that they had "no problem" with the idea but felt it was a poor way of ensuring teaching quality. A good example of the first of these reactions is Matthew, again, who said (see Box 8-7) that he would consider changing universities rather than accept his work being monitored by means of the VLE.

This is an important passage because it brings up several different issues. Firstly, he obviously feels very strongly (as shown, for example, by his use of the word "spying" and his remark about changing jobs) about the concept of the *quality* of his work being monitored, rather than that of his activities being monitored for other purposes, such as the prevention of access to pornography through university facilities. He happily accepts that monitoring for "inappropriate behaviour" does and should be allowed to take place and trusts his managers not to use this information inappropriately themselves. He alludes to rules (of which nobody else I interviewed seemed aware) established by the university to prevent "misuse" (by their definition) of monitoring information and to the fact that "a number of his colleagues" are concerned about the issue. In all these ways, he gives the impression of being a mature user, who knows what goes on and is not concerned himself because of his trust in his management, but knows of people who do have concerns on this issue.

Without reflecting on the fact that their definitions of "misuse" might be significantly different from that of the university.

Box 8-7 Matthew: "That's an indication of misuse of technology"

Q: How about the other way round, that teachers can be monitored by their own faculty heads or by administrators? Does that matter? Does that bother you?

Yes. It bothers me in the sense that if I felt I had a line manager or more senior managers within the university that wanted to use the system for purposes of, "spying" I suppose is too strong a word, but monitoring me in terms of whether or not I'm doing my job properly, I would think about changing my job, because I think that is an indication of misuse of technology, quite simply. I'm not worried about the issues to do with monitoring in terms of inappropriate [behaviour], you know, accessing porn or whatever nor about somebody sending e-mails which are improper and so on and so forth. I am aware, because as I said I'm probably more aware than most of my colleagues, that everything I use on my computer here can ultimately, even going way back, can be accessed, if people want to. I guess I trust my present employer and my present line managers not to use such information, or at least not to use it inappropriately. And we have, obviously within this university and other universities, agreed rules about that. Were I working in another institution, and I haven't got any particular ones in mind (though I might have!), I might give you a different answer to that question. I know a number of my colleagues are concerned about that angle. And yet the technology has always been there to film people, or to just listen in; it's

just, it's a new technology but it does ...

I think it is more pernicious, or potentially more pernicious, simply because of the fact that I now virtually never write a memo, it's always done electronically. I, almost everything one does is there and it's very, very convenient, but it is, I mean, alright, the Pete Townsend thing, you know, accessing the web, did he do it just to see what was there or whatever. No I have, I'll be absolutely honest about it, I have occasionally accessed things because I was interested and I think that's not a bad thing. I mean, I'm not a supporter of censorship, I'm really not. I'm a supporter of appropriate protection for different groups, children, others and whatever which is why I support the use in terms of browsers and so on, of parental control mechanisms and so on and so forth. A very appropriate question raised by my colleague yesterday for a first year course in which he puts in the links to various political parties. He said "I've got a question for you: I'm not sure what to do about it." And he sounded serious so I said "What?" And he said "Shall I put the link to the British National Party on?" So my initial response was to say "Hmm. Might be a bit dangerous because someone could say "Ahh look they're promoting the BNP" but it isn't. So I said "Let's have a look, what else have we got on there?" So he said "the Socialist Worker Party, de de" so I

said "You know, in terms of [?], they are not an illegal organisation, they are not proscribed." He said "Well, they are the official opposition in Burnley, after all". He said "No, we've got to have it on". "You're quite right, we have got to have it on, I think what we do, not for the sake so much of the students but for others that might want to look at it, is to say "The following are links to various political parties, some of whose views you may find abhorrent, as we do. However, since none of these are actually proscribed or illegal organisations, we put them there only for you to look at. There is no question that, for various reasons, different members of different parties are like that. That's it, just the same as you might refer students in a course on fascism which I've taken and taught in the past, to reading Hitler's 'Mein Kampf'.

The second point to note in this narrative is that he sees the tension between privacy and censorship – the contradiction between resisting his work on the VLE being monitored and supporting a person's right to access information, even pornography, if they wish to do so. This is a point that was not made by any other of the interviewees and should perhaps be explored more thoroughly, which I am unable to do as I did not pursue it at this point.

Finally, he raises the question of whether it is appropriate for a teacher to censor the material he puts in his VLE course so as to avoid causing offence to some groups. This is clearly a problem which has been exacerbated by the technology; first, because there was no concept of referring students to visit web-sites (offensive or otherwise) before the advent of the internet, and secondly, because teaching material (such as a web-site reference, or discussion of a contentious subject) is more generally visible, and perhaps more permanent, than an orally delivered lecture or even printed lecture notes. Again this is a tension between censorship and, in this case, educational integrity, and again this is an area which I feel merits more research and discussion.

A different reaction from my interviewees was that of Percy who, when asked how he would feel about the university using the VLE to track how 'diligent' he was being, replied "Well I certainly, I wouldn't mind but I can imagine some people might object. You know, we often find, we've got these swipe cards for when we come into these corridors, you know there's magnalocks on the doors, and it's often occurred to us, for all we know, people have recorded the

times at which you used them, so they can see when you are coming in to work". He was one of the few I talked to who accepted the idea that their performance might be monitored, and he also had perceived that this could have been the case without recourse to the VLE.

By contrast Stanley said (Box 8-8) that he felt sure that surveillance by his management did *not* happen, and that if anyone felt the need to do so, it was their problem because they would be thus shown to be incompetent! This robust reply contrasted with Percy's response ("I certainly shouldn't mind") and Matthew's ("they do but I trust them"), and demonstrated the variation in attitudes on this subject that I found throughout my conversations.

Box 8-8 Stanley: "I'd think they were incompetent"

Q: Surveillance of what [people] are doing...Is that an issue?

... (a very long answer included the following passage) ...

Surveillance of staff by managers? Well, I get accused of optimism, the optimist in me would say, well we are all in the same institution, we are all pushing in the same direction, there shouldn't be any need for managers to do surveillance of staff in that kind of way, and if anybody is doing that, I think they were incompetent and shouldn't be here!

I don't think they are!

I don't think they are, but if they feel the need to do that, something's gone badly wrong with the human management within the institution. That shouldn't have to happen. So I would say that if that emerges as an issue, the problem would lie not with the people being surveyed but with whoever it is who feels the need to order that surveying

8.6 Teachers' privacy from their students

Many of the interviewees voiced opinions about whether they felt threatened by the access to them which the VLE and e-mails provided to the students. In a few instances, this was in response to a question from me but in most cases it just came up in naturally in the conversations when the use of the VLE or e-mail was being generally discussed. A typical response is that shown in Box 8-9, where Justin says that he could have a problem with students expecting unlimited access to him, because he feels it is impolite not to reply quickly. He

makes the point that it is "comforting" for the students to know that they can reach him "any time". Although this is clearly nice for the students, it is less so for the teacher if his privacy is thereby invaded, but Justin does not imply it is an unfair burden imposed by the technology. Rather he sees it as caused mainly through his concern for the students and pride in his work; that that the technology *enables* the practice but does not cause it.

Box 8-9 Justin: "There can be a problem because they call you too often"

Q: How about the problem of, I mean do you have a problem of students wanting too much access to you? Some people say they do and others say it's not an issue.

I don't know if people, what I noticed with students, I think is a very strong point, that it's comforting for them to know that they can reach me any time by sending e-mail. Is like if you carry with you a life insurance. Or you know that your doctor is at the end of the line if you need him. And that's the same feeling. They feel so happy, to know "Ah, so can I contact you?" "Yes", and they go away. So they say, if anything happens, I can go back, and there can be a problem because they are calling you too often!

Yes. It is possible to control that, isn't it, by not turning it on, not responding too quickly?

Ah well I feel impolite, if someone is sending me an e-mail, you don't send an e-mail back {fairly soon}, so someone rings you! I think you have to, so I try to keep myself up to date. And before I go home, I try to make a point of replying all e-mails, and quite often, to my delight, they say "Oh, I'm very pleased that you respond" so I think certain people don't. And because {of this} they get swamped. I try to use the 3-days gap — I don't like anything to go over 3 days. If it is more in a week, I try to use the weekend and sort myself out and start {again}. It's nice to go home and say "I answered everything" because I don't have to come back tomorrow to find it! So I try to do that.

Other I talked to were more hardened. For example, George responded to my remark "I've heard complaints that students send messages at 10 o'clock at night and expect an answer by the next morning" with a laugh and "Oh no, I tell people – I say "don't <u>ever</u> reply. If you're online and they bite you at 10 o'clock at night, <u>don't reply</u>. Because they'll think you are there every night." His use of the expression "they bite you" might imply he saw e-mailing him at

10 o'clock as a malevolent act but he was very clear about how to deal with such acts, in order to avoid them becoming a problem ("don't reply").

Another subject which came up briefly was that of students posting anonymous comments about their teachers and courses on the web. Roger mentioned that he'd read of this happening in America and thought it was rather an unpleasant thing to do, but that he had never encountered evidence of it happening here.

8.7 Teachers' privacy from outsiders

The final discussion topic I had thought I might encounter was whether teachers were concerned about their privacy being threatened from the outside – for example, by 'snooping', via the VLE, on the content of their courses by external quality bodies, rival universities, the press or the police. There was almost no concern about the former at all – only one interviewee (Brigit) brought it up and none of the others even responded to my general question about surveillance by considering whether this could happen.

Brigit's concern surfaced after she had told the story of students being monitored by the VLE (Box 8-3). She then turned to the monitoring of teachers' and related another incident of how she had been asked by the HE Quality Assurance Agency (QAA) to review someone else's course and was disconcerted to find that the Agency had accessed the other teacher's VLE, unbeknown to the teacher concerned, to help the assessment process. Whilst she strongly supported the maintenance of teaching quality, she was surprised that the Agency could access the VLE in that way and was by no means comfortable with the idea.

Apart from Brigit's remarks, the only other (slightly oblique) reference was to potential confidentiality leaks when lan said "If the press had got hold of this⁷⁶, they would have a field day" and I don't think he was envisaging that the press might be able to access the VLE or university e-mail system to find confidential information such as the topic he was discussing.

 $^{^{76}}$ "this" being a reference to problems over student plagiarism the university had previously encountered

And yet it would be possible. The stories which are currently appearing in the press about the UK government's powers and desire to 'snoop' on its citizen's activities and the US government's wide-reaching surveillance of (among other things) what people are being taught, all in the name of "prevention of terrorism", may be alarmist but it is clear that covert surveillance is becoming more common and even more accepted by the general public. And the technology certainly would assist such surveillance. The university could be forced to grant access to UK or other government agencies, for example, to monitor the quality of courses or detect 'suspicious' content (pro-terrorist? religious extremist? politically incorrect?). And 'hacking' into computer systems, and hence e-mails and VLE sites, is not an isolated occurrence. The computer manager at North University reported that over 20,000 attempts at unauthorised access to the university's computer are made per day and that it is inevitable that some will succeed. The assumption at present is that these accesses are not specifically targeted at this university but of course, this is not certain. All that seems clear is that teachers could be at risk in this way and, so far, no-one seems to be concerned or even aware of it.

8.8 On-line identities

Another topic which came up in some of the interviews, and which generated varying responses from my interviewees, was that of the possibility of distorting, or even falsifying, one's identity on the web. This did not fit well into either of the categories (student or staff privacy) which I had ascribed to this theme, so I deal with it separately here.

My interest in this arose when I heard a paper describing an innovative VLE used for a distance learning course where the students did not meet until after the course had been running for some time, or even at all if they did not wish to do so. The presenter (Oleg Liber, Oxford 2002) had said that, because all interchange between his students occurred in virtual seminars, chat-rooms and e-mail, he encouraged them to share details of themselves with the rest of the group, to foster a sense of community and make the communication more 'real-life'. For the same reasons, he also asked them all to put a picture of themselves on to the screen whenever they were communicating anything. He

said he told them that the personal details, and even the picture, need not be accurate: they might prefer to 'enhance' their web-identity, or even to use a completely fictitious one, and this was quite acceptable. This intrigued me. I was interested in the feelings involved, both of those who choose to enhance, or even falsify, their on-line identities, and those who were exposed to these amended or invented identities.

After attending that seminar (and partly because of it), I became more aware of the habit by internet chat-room users of behaving in exactly that way – exchanging personal details and pictures which may or may not be accurate with those with whom they hold web-based 'conversations' – and I was curious about how my interviewees felt on the subject.

One teacher who brought up the subject herself was Fenella (see Box 8-8). She had a particular concern: if a student were to claim to be a fellow student, perhaps to help out a less talented, or absent, friend.

Box 8-8: Fenella: "I wonder if the students are who they say they are"

Q: Do you have any other concerns?

Well, I sometimes wonder if the students logged on are really who they say they are – I mean, I wouldn't always know if someone got his mate to do the on-line quiz things I set sometimes. But I'm not sure it matters ... I suppose it will be more of a problem when the VLE-based work is assessed on-line and counts for a significant amount of marks, but that's not the case yet so I don't worry about it too much.

How do you think you can deal with that?

Well, I would say that you've just got to trust that enough of them will be honest -I think you just have to trust them. And mostly, I do -I mean, there always will be some cheats, and maybe everybody cheats occasionally, but overall, I think most of my students are fairly honest. Perhaps they can see there's no point because it's there to help them learn, and that's what they're here for, after all. Or perhaps they are just afraid of getting found out! Anyway, it's not a real issue, not so far -I don't think it goes on much and I don't think it matters much if it does.

It seems to me there is a lot of difference between impersonating another (real) person and enhancing, or even completely inventing, one's on-line identity. Impersonation (in order to take an exam on behalf of a less able friend, for

example) is dishonest behaviour and can never be acceptable whereas webpersona enhancement is generally fairly harmless⁷⁷ and sometimes even beneficial (for example, a shy student who adopts a different on-line 'self' might manage to overcome their shyness and contribute more readily to discussions (see Jones 2005).

The behaviour mentioned by Fenella comes (in my opinion) under the category of deceit, rather than imaginative manipulation of identity, and could be a serious concern if it affects an assessment. However, Fenella is philosophical about it ("but I'm not sure it matters") because she has not yet had to deal with assessing work submitted on-line, and anyway, she feels that most students can, in the end be trusted. She also pointed out that anyway students could always have cheated when work was submitted in the traditional manner, if they tried hard enough. Like other issues whose cause has sometimes been attributed to the technology, submitting another student's work as one's own or getting a friend to do one's exam is not a new phenomena, although it is certainly easier with the advent of eLT. Some educationalists have contended that this problem should be solved by changing the way students' work is assessed (Hollands 2000, Christe 2003), particularly when distance learning and assessment is involved but there is little evidence of that happening yet. Alternatively, the technologists themselves might be able to solve the problem, with better means of recognising identities (web cameras with in-built iris scanners or text-checking tools which can recognise a substitute author, perhaps) but in the meanwhile, teachers' concern over student on-line identities will no doubt remain.

In general, responses to my questions on the subject of students falsifying their online identities varied. Helen, for example, when asked "How about the issue of a teacher's or student's on-line identity' not being genuine?" replied with enthusiasm "I think that's fascinating — especially since you can't then actually make a judgement about people based on their experience, it's really what they are saying. I think that's <u>great</u>." To her, it was liberating the truth, letting the actual words people said get through, uncontaminated by any prejudices the reader may have, based on looks or personal details. Roger,

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⁷⁷ Though it can erode trust in team members who are unsure of who other members really are.

however, was horrified "But that's terrible, I'm OK with students saying they don't want to tell anything about themselves, don't want to put a picture out, but that's awful, if they lie." I got similar responses of horror from some of my interviewees and indifference, amusement, or even enthusiasm from others. This led me to reflect on these differences and my own attitudes to them.

One difference I could see in these interviewees was that those, such as Helen, who accepted the idea were much younger⁷⁸ than those, such as Roger and Carl, who did not. This caused me to wonder if this could be a youth-culture thing; the young are very comfortable with the concept of web-identity creation and do not see it as lying. Alternatively, the young may be less confident in their own identities and hence keener to 'hide' behind a fictional one than their better- established older colleagues. Whatever the reason, it is an interesting area which may become more important as VLEs are more frequently used for teaching those who will rarely, if ever, meet each other or their teacher.

My own feeling is that, provided everyone concerned understands that the identities may not be accurate, it can be a positive thing to allow people the freedom to be 'imaginative' with their details, and certainly with their photographs. I myself have observed, during my working life, the way appearances can prejudice the listener, or colleague – being any of black, female, very young, rather small, or physically deformed can be a barrier to getting one's message across or having one's work properly appreciated, whereas being male, Caucasian, middle-aged, tall and/or very good looking can be an advantage. If a VLE user is 'disadvantaged' in one of these ways and wants to project a different image, to help their work to carry weight, I would welcome that anonymity which the VLE can provide.

8.9 Summary of conclusions

The picture which emerges here is of one of an initial lack of awareness, followed by confusion and contradictions. These teachers were not particularly conscious of the way the VLE could enable surveillance, and were unclear

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This was the only instance where I thought the responses might be affected by the interviewee's age.

what they felt about it when they did become aware. They were generally sure that they did *not* want to be subjected to any kind of surveillance themselves, but ambivalent about whether surveillance of students was acceptable (or even desirable in some circumstances) or not. They conceded, however, that they should probably tell the students if they were being monitored, although none of them actually did so, currently. Some of them linked surveillance of staff to a lack of trust, and were saddened or indignant that surveillance might be thought to be necessary. There was some acceptance of the use of monitoring to inhibit "unsuitable behaviour", by or against students or staff, and discomfort with the idea that outside agencies (the QAA or police) could access the VLE covertly.

Similarly, when interviewees were invited to consider the way in which a VLE could enable students and colleagues to disguise their identities, most had clearly not thought much on the subject previously, but when they were encouraged to do so, their responses varied widely, from a general enthusiasm for the idea (Olivia) through unease to considerable hostility towards the concept (Roger), at the other end of the scale.

8.10 Reflections

As with plagiarism, there is nothing new in the ability of one group – generally the group with power, such as Foucault's prison warders – to set up surveillance of another. Universities could always check which books students read and how long they spent in the library, or how many hours of face-to-face teaching their staff delivered, if they felt this was a necessary measure of how hard either group was working. Orwellian-style 'thought police' have long had the capability to eavesdrop, via electronic means or human infiltrators, and thereby discover what was being taught in classes and discussed in seminars, to check for seditious material. And students could always submit work written by their friends or resort to the use of a stand-in for their exams. What *is* new in this situation, where e-mails are so widely used and teaching is becoming increasingly based on eLT, is the *ease* with which 'snooping' can be done and how difficult it is for the those under surveillance to know when they are being monitored, what behaviours are being monitored and what might constitute an

offence. Anti-terror organisations may be monitoring teachers to check whether they are teaching "unsuitable" material about Islam, university administrators may be checking how much their teachers are using the VLE, if they feel that low usage implies a lack of cooperation with university policy, and teachers may be monitoring how many hours their students are working, if they suspect that the students concerned are falling behind in their courses. It is very easy to monitor emails or use a VLE's surveillance facilities, and almost impossible to detect.

The contradiction that several of my interviewees displayed, when they defended their monitoring of student communications and activities as justifiable but objected to the idea that they themselves might be under surveillance, is difficult to explain. It is most likely to spring simply from the fact that they know their own intentions are good, their use of the monitoring facility to be benign, whereas they have no idea what the intentions of those who might monitor them could be. Also, as Matthew explained, "keeping an eye on your students" is an integral part of pedagogy, whereas in his view, staff should be trusted to teach the right material in the right way, "without any need for snooping" (his words)

I am reminded here of the two views of Bentham's panopticon: that it is a very benevolent and humane way of keeping control because prisoners don't need to be chained up or bullied into submission (Bentham's view) or that it's an oppressive method, contravening the prisoners' human rights (a modern perspective). Many of my teachers felt that their monitoring of students was highly beneficial: they could quickly spot when a student was in difficulties (had forgotten his password, or was lagging behind his peers) and help them out before the problem became acute. Likewise, the QAA no doubt felt that accessing the VLE to check quality was for everyone's benefit, and antiterrorist organisations always justify surveillance as being for the benefit of all law-abiding citizens.

A point to bear in mind is that we live in an increasingly monitored society so the monitoring of students and staff via their e-mails and the VLE is just one more example, and thus perhaps not worth getting upset about, in the eyes of some. For example, almost every phone call to a commercial or governmental organisation these days starts with a warning that the call may be "monitored for quality and training purposes". But at least this is made clear; I am not aware that email VLE users are similarly warned that they may be monitored.

A further point is the difficulty students and staff would have if they seriously objected to this surveillance. Brigit's students did object to one instance of surveillance, and won their right to avoid it *in that instance*, but I imagine that any student or staff member taking a similar stand nowadays against the surveillance facilities available in the VLE or email systems would simply be told that acceptance of these was a condition of their enrolment/employment at that university.

Interestingly, in a recent case of terrorist activity by a former South University student, the anti-terrorist police had to demand access to confidential details of the student concerned from the university, in face of much opposition from the Students' Union. The records required by the police dated from a time before they would have been stored on the university's Managed Learning Environment (MLE: the VLE and administration files, such as student and staff details, all in one environment) and one is tempted to wonder whether, had that not been the case, the records would have been quietly accessed without permission being sought.

Another point for consideration is that some of the monitoring which takes place via the VLE is indeed for "quality and training purposes". Teachers use the facilities to gauge how usable their on-line courses are and VLE manufacturers apparently use them to discover which features are well-used by (and hence presumably useful to) the students and staff.⁷⁹ Students may object to data about them being collected and used in this way without them knowing or benefitting (as indeed some had done at North University) but it is hard to see this as a malevolent use of the facility.

I was told this by two VLE-manufacturer's representatives as evidence of how they 'continuously improved' their products.

It seems, then, that many of the views of Waldo et al 2007 and others on privacy and eLT (Section 3.6.2) reflect my interviewees' feelings. For example, that it is: context-dependent (one may try to keep secrets from one person but not from another) and exacerbated (but not caused by) the increased use of eLT; and that a balance needs to be struck between freedoms (for example, of information and opinions) and rights (for example, to privacy and safety). However, they show no evidence of Dawson 2006's and Kuehn 2008's concerns about the potential effects of teacher surveillance - rather, they bear out Land and Bayne 2002's views, that UK university teachers are not overly conscious of the way eLT can be used for surveillance of teachers and learners, and that eLT-enabled surveillance and identity-manipulation is not necessarily a bad thing (in principle) though many of them were somewhat uncomfortable with the idea (in practice). What was particularly noticeable, however was the way their views of surveillance and privacy were bound up with issues of ownership and control of information, power and authority anonymity, and trust (as indeed, Waldo had mentioned briefly in Waldo et al 2007:1) which leads me to the next chapter, where look at the way in which all these themes and issues inter-relate.

9 Towards a Conceptual Framework

Preamble: Chapters 6, 7 and 8 describe the main themes (referred to here as my "dominant themes") which emerged, through my analysis method, from my interview transcripts. That is, they discuss what my *interviewees had actually said*. This chapter is different in that it concerns what *I then made* of these results. I reflect on these themes and how they might be interlinked, look for evidence of such links within my transcripts and elsewhere, and draw conclusions about what these linkages might imply. In effect, the preceding chapters describe evidence-based results, whereas this chapter consists of my interpretations, and attempts to make sense of, those results.

At the end of the chapter, I draw conclusions from my findings, related both to the subject of teachers' responses to the advent of educational technology and to the methodology I used to study them.

9.1 Introduction

The three preceding chapters describe the dominant themes which I identified through analysis of my interview transcripts; that is:

- Control (including related issues of power and authority);
- Knowledge ownership;
- Privacy (including issues of surveillance, secrecy and subterfuge)

In the course of my analysis, it became apparent that there are potential connections – or at least a shared 'meta-layer' – between these themes. For example, each seems to relate to the issue of a teacher's *sense of role* or *identity*. Some of my interviewees had in fact said (Box 9-2) that they felt their roles were changing, or even that they no longer fully understood their function in Higher Education at all, as a result of the growing use of computer technology in their teaching practices. Although my analysis method did not identify concerns over identity as a dominant theme in its own right⁸⁰, it did lead me to speculate that my interviewees' concerns over loss of control, knowledge ownership and privacy might be related to some role/identity issues which they were facing and I explore these potential links in this chapter.

and

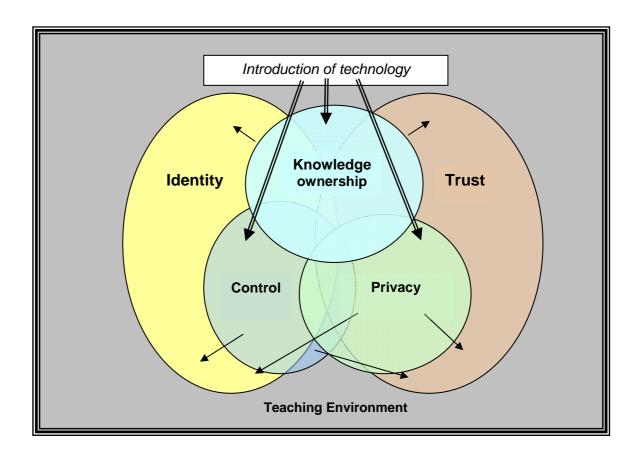
Similarly, it also seemed that there were links of some sort between my dominant themes and issues of *trust*. Again, a few teachers did raise the matter of trust in their interviews (see Boxes 9-3 and 9-4) and a number of relatively recent books and papers (for example: Bottery 2004, Jameson *et al* 2006, Jameson & Andrews 2008) also deal with this subject in relation to the education sector. Prompted by these remarks by my interviewees and the related research papers, I started to reflect on potential connections between my dominant themes and issues of trust. I considered, in particular, whether my interviewees' concerns over plagiarism, privacy and loss of control could be causing them to lose trust in any or all of their students, their colleagues and their managers, which may in its turn have an adverse effect on their teaching. As with role/identity, these possible links between trust and my dominant themes are explored further in this chapter.

[Remark: There is, of course, an alternative possibility to the idea that the introduction of eLT might be engendering feelings of unease over knowledge ownership and the like, and that these feelings are then contributing to identity and trust-related issues – it may be that the converse is true instead. That is, it is conceivable that a lack of trust or clear sense of identity, caused perhaps by some different agency, could actually be the root cause of those feelings of unease which I had been blaming on the advent of computer technology. This is discussed further in Section 9.5, at the end of this chapter.]

9.2 Conceptual framework

When considering these potential relationships between eLT, my three dominant themes (which all came out of the interview texts) and the two 'meta-themes' (which emerged from my *analysis of the themes* and which appear to *underlie* all three themes), I found it helpful to construct a diagram – as it might be, a potential conceptual framework – within which these various elements might be situated. This is shown in Box 9-1 overleaf.

⁸⁰ See Chapter 4 for how I define 'dominant themes' and why sense of identity and trust did not qualify.



Box 9-1 <u>Intersecting zones of concern</u>

Here, individual *areas of concern* (the three themes) are shown existing largely (but not entirely) within an environment of some unease about Trust and sense of Identity. There is considerable overlap among the areas of concern and between these and the Trust/Identity environments but none of the former exists entirely within another area of concern or within the Trust or Identity environments. Any individual issue (say, over a market in courseware) may fall within one, two or even three areas of concern and affect – or be affected by – either, neither or both of the 'Trust' and 'Identity' environments.

In this model, when the use of e-learning technology is significantly increased – especially if this happens quickly, extensively or without much user consultation – one or more of the areas of concern is impacted, with a knock-on effect on the issues about Identity and Trust which underlie them.

With this potential framework in mind, I began to reflect on what other researchers had been saying about HE academics' feelings on role and identity.

9.3 Teachers' roles and perceived sense of identity

9.3.1 Introduction

The following paragraph about the importance of understanding teachers' perceptions of their professional role and identity is included in the abstract to Day, Kington, Stobart & Sammons 2006:60.

"In much educational literature it is recognised that the broader social conditions in which teachers live and work, and the personal and professional elements of teachers' lives, experiences, beliefs and practices are integral to one another, and that there are often tensions between these which impact to a greater or lesser extent upon teachers' sense of self or identity. If identity is a key influencing factor on teachers' sense of purpose, self-efficacy, motivation, commitment, job satisfaction and effectiveness, then investigation of those factors which influence positively and negatively, the contexts in which these occur and the consequences for practice, is essential. Surprisingly, although notions of 'self' and personal identity are much used in educational research and theory, critical engagement with individual teachers' cognitive and emotional 'selves' has been relatively rare. Yet such engagement is important to all with an interest in raising and sustaining standards of teaching, particularly in centralist reform contexts which threaten to destabilise long-held beliefs and practices."

Day *et al* are actually referring in this article to school teachers but there seems to be no reason why HE teachers should be any different. Taking the statement "If identity is a key influencing factor..." as a rhetorical remark – in other words, that we should assume this to be the case – this paragraph is a strong justification for the need for a better understanding of HE teachers' sense of identity.

There has been a number of publications in the last decade on academic roles and sense of identity in the changing HE climate of the 21st century (for example, Henkel 2000 and Sikes 2005). Henkel is concerned with the possible effect of the various recent reforms and restructurings of the HE sector on academics' sense of identity and, in particular, whether the new HEI structures are undermining academics' allegiances to their disciplines in favour of strengthened allegiances to their university or to their specific role and position within it. She maintains that changes in educational policy have strongly affected academic values, academic self perceptions and identifications, and academic agendas (Henkel 2001). In particular, she argues that power relations have changed, academic freedom (including the freedom to be

trusted) is perceived by many to be at risk, and a number of academics are experiencing any or all of a confusion of identity, a decrease in status and a loss of self-esteem. She also finds that academics are responding by means of a variety of coping strategies with some totally ignoring the changes, some adapting to accommodate them, and others finding ways to subvert them or actively resist them, individually or collectively.

My interest, in contrast to Henkel's, lies in examining what effect the introduction of eLT may be having on those same identities but the two investigations have several points in common. For example, the book's abstract (ibid) explains that "this book starts from the assumption that the concept of identity is central to individual academics and to the working of academic systems" and this has been one of my premises, too. Furthermore, I have evidence in my interview transcripts of similar effects to those described by Henkel: my interviewees also talk about changes in academic values (for example, regarding ownership of knowledge) and self perceptions (for example, whether they still see themselves as experts in their field, or simply as "deliverers" of an educational "product"), but in my case this is within the context of the increased use of e-learning technology rather than educational policy changes. In addition, like Henkel, I have found that my interviewees appear concerned with changes in power balances, with threats to their academic freedom and, as discussed later in this chapter, with the notion that the increase in the use of eLT in university teaching might be linked to a decrease in levels of trust between academics and their managers, students and peers. Finally, I have also found evidence of a range of coping strategies, including academics ignoring or resisting the advent of the technology and finding ways of subverting the changes.

9.3.2 The interviewees' views

Although I did not identify teachers' sense of identity as a *dominant* theme, I did however find, when I re-examined my transcripts, a small number of remarks on this subject, in sections where the interviewee was talking about another subject such as control or plagiarism. Box 9-4 shows these remarks and, where necessary, the questions which had prompted them.

Box 9-2 Teachers' sense of identity – interview quotations

"Without me realising it, you've found one of the areas where I am a bit concerned. In the sense (not so much only for myself but I think more for others) that it is about reexamining what one does as a "lecturer". Because increasingly that isn't what we do. And although my job title, my role is Principal Lecturer, ... am I a lecturer? Well, actually, not very often. That's partly because I do lots of other things now, besides teaching but it's also for reasons which we've already discussed. What I do in terms of, let's call it "course delivery" and course design and all of the other things associated with "teaching" is more about (I hate the phrase but I can't avoid it), it's about facilitating learning. And I think that process has been changing quite rapidly. It may be speeded up quite a lot by the more recent introduction of VLEs and so on but it's been there for quite some time"

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Q: [How about] when more is done electronically rather than ...

The 'Sage on the Stage' you mean?

That's it – I knew there was an expression for it.

I agree. I think there's a real mix at all levels including management levels, there's a really mixed up set of feelings about all this. ... I mean, it's really interesting the building policy of the university, on the one hand we're talking about doing more facilitating and helping and building shared understandings and so on and then we're building huge lecture theatres ... and, you know, we're talking about filming the good lecturers. So, for goodness sake, which way are we going? What's going on?

[∞] Stanley

Q: What else do you think [about the VLE]?

I do **not** like being called an instructor! I do not like being called an instructor. That's culturally wrong. We're **not** instructors! tutor, teacher, lecturer, anything but instructor!

Nigel

So I mean we all, in the end, we all of us take a, **try** to take a kind of balanced view. I know that some people are, I do know some people, not within my group, but I do know some people who are very far behind traditionalists who say "No, I want to do my **lecture**, that's what it is about"

Stanley

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Well, in a sense, that's what concerned me about the VLE because we've been through this exercise where we are having less and less class contact, and the government seems to want us to take on more and more students (and I know I'm not just speaking for myself here).

But various colleagues have voiced the view that "you know, the next thing is, we won't have any jobs because it'll all be done by computers".

Matthew

As illustrated here, eLT has prompted a change of role for many teachers; the cliché "sage on the stage to guide on the side" was used⁸¹ by more than one of my interviewees including Stanley (above). Changes in teachers' roles included going from teacher and lecturer to 'course designer' or even 'course deliverer', to paraphrase Matthew above; and from being a physical presence to becoming a disembodied one. In addition, the apparent role of universities seems to have been changing – in some cases at least – from privileged seats of scholarship to 'digital diploma mills' (Noble 2002), and from places where knowledge is constructed and imparted by and to a small group of focussed individuals, to large-scale quasi-training organisations, where a significant proportion of the population might hope to acquire useful skills to fit them for a job (Star & Hammer 2008). It would not therefore be surprising to find that these changes are also affecting some university teachers' perceptions of their role in the world of Higher Education.

All of these threads came up in my interviews, although not as strongly as the three topics which I isolated as my dominant themes. In my view, they can be seen as interconnections between the dominant themes, as I explain below.

It is important to try and distinguish between the changes in sense of identity, and teachers' reactions to these, where the root cause is principally the introduction of eLT into teaching practices, and those which may have been caused by other changes in universities or in HE as a whole (although some of the latter, such as the disenfranchisement blamed by Holley and Oliver 2000 on the advent of the 'new managerialism' in universities, may also be secondary effects of the increased use of eLT in universities). It could be argued that such changes in university management style and practice would have been very much more difficult to achieve without technologies such as managed learning environments but it would not be fair to say that the technology had actually *caused* these changes and reactions. We also need to consider which is cause and which is effect – whether the increased use of technology may be causing teachers' concerns about knowledge ownership, for example, which are in turn giving rise to questions of identity, or whether, conversely, some outside agency (such as the 'massification' of universities,

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Not necessarily pejoratively; some said they preferred being a "guide" than a "sage".

see Wooldridge, 2005) is causing teachers to question their role in HE and this is in its turn prompting concerns about their ownership of knowledge.

9.3.3 Changes in teachers' roles and identities

The principal change of role which came up in my interviews concerned the relationship between teacher and student – the expressions "sage on the stage" and "guide on the side" were mentioned by several of the interviewees. Reactions to this varied from the enthusiastic remarks of Stanley "I love it, just love it, watching them work it out for themselves" to Roger's rueful acceptance "I suppose I'm a bit peripheral to it these days, they can find out much of what they need to know over the web, and I guess I have to come to terms with it".

Other identity shifts which were mentioned in regard to the interviewees' relationships with their students included a change from being the student's "friend" to that of being a "policeman" – or even a spy (Roger, again: "Well, I feel a bit of a spy when I snoop on them on line, even though it is in a good cause" – and the effect on the teacher's role of the disembodiment associated with teaching in a VLE (Fenella: "it's a bit odd, you know, not seeing each other face to face when you're doing a tutorial: it's like you're not real people, neither of you").

A further role shift which is causing concern among the teachers I interviewed is the matter of whether they are involved in the whole teaching process in the traditional manner – conceiving the idea of the course, preparing every item of course-material (reading lists, lecture notes, handouts, tests, project topics, examination papers and so on) and then participating in all the course activities (lecturing, tutorials, field work, examination marking, and the rest) or whether they are only expected, perhaps only allowed, to do just a part of this process. In particular, they were unhappy with the idea, popular with some VLE vendors that the course *designer* and the course *deliverer* might – perhaps should – be two different people. Several of them talked about the idea that master-classes might be purchased by the university for the local lecturers to 'deliver' and that, conversely, they themselves might be required to design and produce courses for someone else to give to the students. While they all accepted that this might happen informally – that they might inherit

courses when they took up a new teaching post, or that someone else would deliver their lecture if they were sick, or otherwise absent – they voiced some concern that this separation of the process into parts so that different people could undertake them would become the accepted practice in the future.

Finally, a few of my interviewees showed concern that university teachers' roles are becoming undervalued by their students, their managers, or by Society as a whole. Roger said: "Time was when we were considered valuable members of Society – we could even sign passports, I think – but that's long gone? I think we get paid less than the average dustbin-man, for a start!" and similar remarks cropped up in a few other interviews. They were always said light-heartedly, it is true, but there seemed to be an underlying concern – that the teacher's role might be changing from that of an essential member of Society to a less valued one which could eventually be replaced by technology, so that the teacher could become redundant.

I examine these potential links – between teachers' roles or identities and my principal themes, control, knowledge ownership and surveillance – in the following three sections of this chapter.

9.3.4 Links between control/power/authority and role/identity

Logically, there would appear to be close links between concerns about role/identity and issues over control, power and authority. To return to the sage/guide analogy, you might see the sage as having more authority than the guide who only shows you the way, and you would probably have a more valued relationship with a friend than with someone whose role is to spy on you (even though the latter might wield more power over you). Furthermore, a university teacher is universally seen as a professional of some standing whereas a course designer might be seen as "just a 'teccy' ", at least according to Olivia⁸². Equally, it is self-evident that someone would have more authority in a society if they are considered to be essential to that society, rather than an undervalued, even redundant, member of it. In other words, the perceived changes in power and authority spoken of by my interviewees might be augmented by similar effects linked to changes in their roles and

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⁸² It was clear from Olivia's tone of voice and her use of "just" that in her opinion, a' teccy' was definitely a person of lower standing than a university teacher.

professional identities, thereby adding further unease to an already stressful situation.

Again, on the subject of links between a reduced sense of control and a change in role/identity, the distribution of the teaching process across several different roles is likely to be associated with feelings of loss of control: it is clearly not possible to retain control over the whole course if you only deliver material designed and produced by other people, or design lectures which will ultimately be given by someone else. Finally, it seems likely that teachers might find it hard to feel confident in their status and authority, or to feel fully in control, if they are a disembodied presence in an electronic chat-room, or invigilating an on-line examination, or delivering a lecture entirely over the internet, rather than having an actual, bodily presence in front of or alongside their students.

All in all, the two themes appear to be strongly linked – the increased use of eLT and perceived changes of role and identity are both likely to cause feelings of loss of control and authority in university teachers and, conversely, a sense of reduced control and authority is likely to cause discomfort or confusion in teachers about their role and professional identity. When this is taken with the fact that the increased use of eLT is at least an enabler, and possibly a significant contributing factor, to both the role/identity issues and the control authority concerns, the picture becomes rather complex – a subject to which I return at the end of this chapter.

9.3.5 Links between knowledge ownership and role/identity issues

Turning to issues over knowledge ownership, once again this area of concern has logical links with the matters of role and identity. The sage possesses the knowledge him/herself whereas the guide simply knows where to find it. A teacher who is concerned over no longer being the students' prime source of knowledge may be equally concerned about no longer owning the knowledge which they need in order to be respected as such. Similarly, teachers might reasonably feel they own their knowledge whereas course designers — or course deliverers — could not. And a teacher who is physically present, standing in front of a class, clearly demonstrates their mastery of the

knowledge which they are imparting to their students whereas, in web-based teaching, the knowledge might be seen by the student as residing in the web, rather than in the teacher's head and experience.

There are similar connections with other aspects of teachers' role-change. For example, a teaching role which is no longer seen as essential may have become devalued through their no longer being perceived as having unique and special knowledge which is unobtainable elsewhere. Conversely, teachers who feel undervalued may be anxious to retain ownership of 'their' knowledge, to bolster their failing 'value'.

As with control and power, then, there are clearly many interconnections between issues of knowledge ownership and those surrounding role and identity changes, with the increased use of technology heavily involved throughout.

9.3.6 Privacy issues and concerns over role and identity

Finally, I consider whether there might be possible links between issues of privacy, surveillance and deceit and concerns over changes in role or identity. Clearly, a disembodied presence, which may be an integral part of a university teacher's eLT-enabled role, is highly conducive to secrecy and deceit. Furthermore, a change of role to one which depends on students' proficiency with eLT is almost bound to involve checking on their use of the VLE (for example in case they are struggling, and to offer help if they are) so eLT-enabled teaching is very likely to be linked to eLT-enabled monitoring, or what two of my interviewees called 'snooping' on their students via the VLE.

But there is more to it than that. There has been for many years a strong movement in favour of a 'student-led' pedagogical style, where students take a greater control of their own learning than in some previously popular 'delivery' teaching models. This has become generally accepted as a far better way of teaching for many good reasons but most models expect the teacher to keep a careful eye on the students' progress, especially near the beginning. Taking responsibility for one's learning does not necessarily imply being left to sink or swim, before you have even learnt how to take that responsibility. When student-led learning goes hand in hand with eLT based learning, and when

some students are still far from adept at using the technology when they arrive at university, it behoves a good teacher to check how well they are getting on with the technology. They could, of course just ask "how are you all getting on with the VLE?" or even leave it to students to volunteer the information ("if any of you have problems with the VLE, just let me know") but the teachers I asked about this said some students would not answer the direct question, still less volunteer the information, so they were not prepared to risk this approach. And what better way to see how they are getting on would there be than to check which had not logged on at all, which were not yet doing so very often, which had no files set up, and so on? One of my interviewees did in fact say he checked frequently during the first term because many students had difficulty getting a password, and never told anybody, so were unable to even start their learning, let alone take control of it.

A similarly argument applies, of course, to university managers and those responsible for designing and rolling out eLT in the university. They want to check how *teachers* are getting on with using the technology, so as to spot those who are struggling and to improve the quality of the product or service they are offering. A caring manager, a committed technologist, doesn't want to leave the matter to chance; and again, how better to do it than to use the VLE's inbuilt monitoring facilities (which are indeed promoted by the vendors as ideal for the task)?

Another change in Higher Education (as in many other areas of modern life) which has affected teachers' roles is the increased accent on measuring *quality*. Exactly how teaching-quality control is implemented may vary between universities, and even between faculties, but several of my interviewees remarked on how their role seemed to have come to include so much, and such detailed, reporting for "quality purposes". And the same applies to their managers, who have to report up the food chain, and ultimately to "the government", to use Roger's vague terminology (see Section 9.4). Again, the eLT stands ready to collect this data conveniently and comprehensively, and indeed, for some questions, 'snooping' on people's use of the VLE may be the only way of getting the required answers.

Finally, there is the increased accent on Health and Safety and fear of litigation, which seems to have affected all walks of modern life, including universities. Teachers, it seems, can't just be responsible for teaching nowadays: they must also help to protect the students and the university from mishap or blame. One of my interviewees, when we were discussing privacy, said that all e-mails from a period 6 months previously had been retrieved and examined in connection with a student/university dispute, and that he was surprised the university could do that, as the writers of the emails had presumably assumed they were confidential. Others talked about the perils of 'lurkers' in chat rooms and people using the internet for illegal purposes, and how they were happy with the use of surveillance to protect against that sort of danger, but felt that it was difficult to know where to draw the line between acceptable and unacceptable surveillance.

9.3.7 Summary

In summary, the links between eLT, teachers' sense of identity and my dominant themes – control, knowledge ownership and privacy – seem to be strong but complex.

For example, teachers in a VLE can become a disembodied presence, whose authority and hence sense of control is thereby diminished, and a move from being a 'sage' to a 'guide' could also erode control and authority. Likewise, splitting the teaching role between 'designers' and 'deliverers', which is being encouraged in some quarters, is likely to reduce teachers' feelings of control over their teaching and authority with students and their non-partitioned colleagues.

Similarly, the same splitting of roles could lead to neither side feeling any sense of ownership of the knowledge concerned, and a disembodied teacher cannot demonstrate his knowledge as clearly as one who is physically present

Finally, various types of eLT-related changes in teachers' roles appear linked to the ability to present a distorted or secretive persona in the VLE and, conversely, to support the ability (sometimes even the necessity) to use the monitoring and facilities afforded by eLT. All these links, along with those between my themes and issues of trust, are considered further in Section 9.5.

9.4 Trust

9.4.1 Interviewees' views

As with issues of teachers' sense of identity, the subject of *trust* did not emerge as a dominant theme during my analyses. However, a few of my interviewees did mention trust during our discussions (see Box 9-3) and one was quite vociferous on the subject, as I describe in Section 9.4.2.

Box 9-3 Interview quotations about trust

Q: How about the other way round, that lecturers and teachers can be monitored?

... I guess I trust my present employer and my present line managers not to use such information, or at least not to use it inappropriately. And we have, obviously within this university and other universities, agreed rules about that. Were I working in another institution, and I haven't got any particular ones in mind (though I might have!), I might give you a different answer to that question. I know a number of my colleagues are concerned about that angle.

Matthew

000

Q: What about ... your managers monitoring you?

...teachers have always been trusted, in the past, to teach in a good way, and to teach good stuff, so it'd mean they weren't trusting us any more, wouldn't it? Perhaps they don't! I don't know

Roger

000

Q: Picking up on something you referred to ...the dispute a couple of years ago, yes that wasn't a technological issue then?

No, no ... [but it] creates a barrier which means you're not always as honest with the people at that kind of level as you would be – I guess you don't trust them – because you're aware that you're dealing with something that could go very badly wrong.

Stanley

9.4.2 Types of trust issues

In the quotations shown above, my interviewees voiced concerns over two very different trust-related issues: surveillance and working in a distrustful climate. Although some of these remarks were slightly prompted by questions from me (as shown in the Box), there was no prompting involved where Stanley's comments on the ill-advisability of implementing the new technology

in a climate of mistrust (Box 9-4). North University had suffered an industrial dispute, largely caused by the introduction of a computer-based work planning tool, a couple of years before my investigation and the memory was still fresh in the minds of some of my interviewees.

The person who said most on the subject was Stanley and his remarks prompted me to divide comments on (mis)trust into five types – mistrust of management; of colleagues; of students; and of the technology/technologists; plus the difficulties of implementing radical changes in a climate of mistrust – and I discuss each of these types of issue in the rest of this section.

Box 9-4 Some quotations from Stanley about trust

<u>Trusting management</u> (not to have hidden agendas)

"To that extent, I really quite welcome what [IT has] got to offer, but I'm very, **very** suspicious of people who use it to support other agendas such as saving money."

"I do think [trust is] a deep issue, it's come up in two or three places. I think it's a deep issue and it's a very fragile thing and it can easily be damaged. ... They can say what they like but there's obviously a feeling here that computers can help you reduce the number of academics further."

Trusting colleagues (to be open and honest with you)

"[Are we sharing and being honest?] I think in some fora, yes. In other fora, it can be more difficult to come clean. Within a subject group, within this university, I think we're very straight with each other. Within, again I can only speak about my subject area here but I believe within my discipline, people will be very blunt and honest with each other. And, having been at this conference last week, there were three or four different working groups working away at it and then we ended up reporting to each other about what we had been doing. As far as I could tell, there was real honesty. People were being very, very open with each other about what their feelings were, about what worked and what hadn't worked and so on. But that's not very usual, you know, outside these groups ..."

Trusting students (not to cheat)

"So you've got to trust each other, trust your management, trust your students that they're not going to abuse it by getting their mates to do the online tests, so as the technology comes in the way, in between things, there is an awful lot of trust involved.

Trusting the technologists (not to waste people's time)

"If you're talking about feelings again, I think there's an element of suspicion that comes in as well in that we've seen other packages come in, be sold very hard, and then disappear. Our old system, for example. Oh, 3 or 4 years ago it was considered a wonderful environment, why don't we all use it to get in touch with our students?" and so on. And set up virtual environments. Of course it's a thing of the past now. And so you think, well this one will probably go the same way and there'll be another one along in a minute! "

<u>Trusting the technology</u> (not to let you down)

"In fact, there's another example from this week, the system has gone down, changes have been put in, they've appeared on some machines but not on other machines, so you're not sure you're getting the right answer when they come out in print so we've had to post on boards and so on. Huge amounts of strain. ... And the central department is blaming the schools, the schools are blaming the central department, nobody will take responsibility, ands that kind of thing is damaging the trust rather than the other way round. And again there's still an underlying feeling of not quite trusting what's going on. ... We were thinking "Hang on, what are we doing here? Why are we trusting this system?" "But eventually,[you have to] trust that your technology is working right.

Implementing IT in a mistrusting climate

"But I think there are other fora in which people find it more difficult, particularly if there is — I mean, I don't want to sound too bad here — if there's suspicion of the motives of the senior levels of management, then people will be much less honest about things not working, maybe for understandable reasons, maybe for reasons which we imagine but still valid — absolutely. And I think the management here has got particular problems because there were difficulties with them over staff relations ... and people don't forget. And in fact I've taken part in feedback sessions ... and said "Quite honestly, you can't win to some extent, whatever you do, you've just got to live and gradually, regain some kind of trust". And I think that extends to talking about academic experiments, you know, there's also an air of some kind of suspicion behind some of these developments. You know, people use words like "band wagon" and "career building" and this kind of thing and you do get the feeling sometimes that the ideas are being pushed, even though they've not been entirely validated.

I consider each of these types of issue in the following paragraphs.

Trusting management and "the government"

The first two quotations in Box 9-4 indicate some mistrust by Stanley of his management. North University had been an early pioneer of the use of the VLE and was actually on its third implementation at the time of my enquiry but Stanley still didn't trust its management's reasons for introducing the virtual campus and its associated technologies. He had often been told that the whole purpose of introducing the eLT was to improve the quality of teaching and learning at North University, and thereby benefit its students *and its teachers*, but he suspected it was actually intended as a means of saving money and reducing teaching staff numbers. Such mistrust is not uncommon, notwithstanding the fact that copious studies have concluded that eLT rarely or never saves money or head-count in total, although it might reduce the need for some types of jobs (often of the less skilled variety) and increase the need for others (often requiring more specialist skills and knowledge).

A similar distrust of motives was expressed other interviewees including Roger (Chapter 6) who voices concerns that management could "snoop" on what his course covers and that "they" (whom he vaguely identifies as "the government, I suppose") could interfere in what and how he was teaching (Box 6-12).

Trusting colleagues

The third quotation in Box 9-4 touches on the subject of trust between colleagues, in this instance about how effectively eLT was being used in North University (Stanley felt that he could 'come clean' with his colleagues about what worked well and what didn't but that it might be damaging to his own and his university's reputation to admit this to colleagues in other universities). Another example of would be the concerns voiced by some of his colleagues and one of my interviewees at South University about the ease with which colleagues could plagiarise their work (see Chapter 7).

Trusting the students

The third category of issues in Box 9-4 mentions the need to trust students, which had come up more than once in previous interviews, especially on the subject of knowledge ownership and plagiarism (see Chapter 7). Other trust-related concerns had been associated with students being deceitful about their

identities (for example, in VLE-based distance learning), as explored by Turkle 1996 etc, Lowe 2006 and others. Power and control, too, had links with trust: for example, Stanley has said earlier that he had to trust the students to give control back to him, after he had let them explore topics on their palm-tops during lectures.

• Trusting the technologists and the technology itself

Stanley voices his mistrust of both the technologists and the technology in the fourth and fifth quotations in Box 9-4. The first concerns his suspicion that the technologists (ranging from the eLT manufacturers through to his own information technology department) were pushing their products simply to further their own interests, rather than for the benefits of teachers and students, and the second is a tale of work put at risk through unreliable technology, which is been mirrored in several other of my interviews (Roger, for example: Box 6-4). Both of these complaints, however, seem guite mild compared with Olivia's outburst (Box 6-5) or Nigel's intense scepticism about the motives of the technologists ("they just want to push their own products, they don't care about teaching"). All these interviewees linked concerns about power with mistrust of the technologists ("they are already interfering in how we teach ... if they start telling us what to teach as well ..." Roger had muttered) and some also linked concerns about knowledge ownership ("these big IT companies just want to get hold of our work") and secrecy ("we don't really know how much the technology can be used to spy on us, do we?").

Implementing eLT in a mistrustful environment

The last quotation in Box 9-4 concerns the difficulties inherent in implementing a VLE in an environment where trust has been lost through some other agency (in this case, because of a fairly bitter industrial dispute at North University). Stanley brings together several of the strands of trust/mistrust and other concerns discussed in previous sections (knowledge ownership, power and so on) when he describes how some of his colleagues oppose the introduction of new technologies such as the VLE because they associate them with surveillance, loss of authority, lack of control over their own materials, changes in their role and so on, all of which were at the heart of the dispute. He is wryly aware that, in the aftermath of the dispute, the

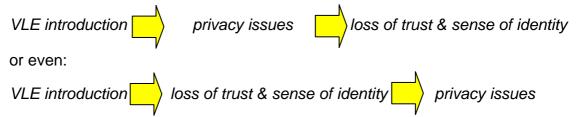
management "can't win, to some extent, whatever [they] do" and that the technology will be resisted by some, despite its merits, until the memory of the dispute has faded.

9.4.3 Links between trust and dominant themes

As the above discussion has illustrated, there are many links between issues of trust and my dominant themes – control, knowledge ownership and privacy – which emerge from this research. Some are obvious – concerns over surveillance imply lack of trust by the spied-upon and concerns over plagiarism imply mistrust in the honesty of colleagues and students, for example – and some are more complex. Furthermore, there are interactions between trust and the role/sense of identity changes discussed earlier in this chapter, to make the picture even more complicated. However, what is abundantly clear is that the potential conceptual framework shown in Figure 9-1 is but a very simplified version of the links between the issues outlined in Chapters 6 to 8 of this thesis.

9.5 Cause and effect – chicken and egg

When I began my exploration of whether trust and sense of identity might be the links between my dominant themes, I was expecting some clear 'chains of consequence' such as:



Instead, I have found something rather more complicated which I see as the very heart of my findings. This is not altogether surprising, nor can it be resolved here – the dominant themes emerge clearly and robustly from the interview analysis but the linking themes are more a matter of conjecture, illustrated by a limited number of examples. It will require much more work, including more interviews, to obtain a better understanding of which is cause and which is effect – if indeed it is that simple. Suffice to say at this point that the dominant themes appear to be interrelated through the linking 'meta-themes' and that it could be very important for Higher Education and its stakeholders for the topic to be further explored, as discussed in Chapter 10.

10 Reflections

In the preceding chapters, I have described this research: its background and context, approach and methods, how it was conducted, and the results, deductions and conclusions I have arrived at. In this final chapter, I reflect on the investigation as a whole, including its original purpose and how well it has answered the research question. I also consider some questions which remain unanswered by, or arose as a direct consequence of, this research.

However, it is clear that Higher Education and eLT have both moved on while this investigation has been in train. In recognition of this, I summarise and comment on any changes in technology, higher education or the broader environment which might have a bearing on how this research may be interpreted. Finally, I reflect on the potential implications of my findings and conclusions on the UK Higher Education sector and all its stakeholders.

10.1 Hypotheses found and tested

This journey, in Kvale's metaphor, has been a long one – much longer than I ever expected – and it has taken me to unexpected territories. When I started, I imagined I would be concerned primarily with technological issues and I thought I might find dislike, apprehension or resentment of the technology. Instead, I found considerable enthusiasm for the increasing introduction of eLT into Higher Education teaching methods, at least at the surface level, among most of the teachers whom I interviewed. However, as I probed deeper and discerned reactions to eLT which appeared to be less straight-forward, I was further surprised by some of the specific areas of concern I discovered. In particular, my exploration of the potential links between these areas of concern – the issues of secrecy/privacy trust and roles/identities – were unforeseen by me at the start of this research. These surprises have not only made the journey enjoyable, and even exciting at times, they have also reflected well on the methodology which I chose, after some uncertainty, to adopt in my investigation.

My approach was one of unconstrained discovery: I did not start out with a set of theories which I undertook to test, but instead I explored my chosen field and allowed potential theories to emerge from it as I researched it. Now that I

am reflecting on what I have heard, read and discovered, I can see that several hypotheses have in fact emerged from this research – had I been following a different methodology, I might have postulated these at the start and then tested them through my research.

The following is a summary of these hypotheses, and in what way this research has tested them⁸³.

- The widespread and rapid introduction of educational technologies such as VLEs into university teaching practices is causing feelings of discomfort in some university teachers
 Tested through interviews
- 3. These perceptions of loss are interrelated, or underpinned, through two further sets of concerns: a reduction of trust in their working lives and a sense of confusion over their role and identity in the new HE world Discussed but not tested
- 4. The introduction of eLT was the cause of the control/privacy/knowledge ownership related issues which, in their turn, caused the trust/identity concerns (rather than the other way round)
 Discussed but not tested

A further hypothesis is associated with this research's methodology.

5. Kvale's 'traveller' methodology and the use of unstructured interviews, can afford access to interviewees' feelings which may not be reached through use of more formal methodologies and tools

Tested through interviews

10.2 Some questions answered

This section addresses the following questions have been posed in this thesis:

- Is any of this new (or was it ever thus)?
- Was technology really the cause (or was there something else)?
- What about the other stakeholders don't they matter too?
- What does this say about university's role in society?

Chapter 10: Reflections

Note: of the above, I regard hypothesis 3, concerning the links between the dominant themes, as the crux of this research.

10.2.1 Is any of this new?

A concern which has sometimes troubled me, when I have been studying the reactions of HE teachers to new technologies, is that, whereas of course the technologies are new, the reactions may be as old as education itself. Are these reactions - feelings of lack of control, privacy or ownership, concerns over trust and identity – the same ones that early educators felt when people started writing down their teaching material instead of keeping in their heads and declaiming it to those who gathered round? Or as medieval monks felt when printed books made their previous knowledge, kept securely in hand written books owned by a very select band of learned teachers, apparently freely available to all who could afford to buy a book? In fact, could I conclude only that nothing changes, that man continues to react to change in the same way as he always has and the current university teacher is no exception to this? My answer is that this may well be the case but that that does not obviate the need to understand the effect such major changes will have on the lives and feelings of teachers and to take this into account when developing and implementing these technologies. In addition, whereas these changes may be similar in concept to the invention of the book or the printing press, they are happening very much faster and affecting a very much larger group of people than the previous changes with which they might be compared. It took many centuries for printed books to become freely available and affordable, and hence commonly owned by the average student, and higher education teachers and learners were still a very small community right up to the middle of the 20th Century. In contrast, the internet and VLEs have come, as it seems, out of nowhere and now dominate the university scene and affect, not a few, but a population of over a hundred thousand university teachers in the UK alone, not to mention some two million university students and the many millions in the rest of the total education sector. Furthermore, if we are indeed comparing the introduction of the internet and the tools which it supports, with the advent of books and the printing press, it still places the current changes among a set of events which happen only once in a millennium or two, which should certainly make them worthy of investigating.

So, whether or not these responses could be described as "just what always happens", "always" might be no more than once in two thousand years and the effects are being felt much more quickly, and far more widely, than before. For both these reasons, they should therefore be taken very seriously indeed.

10.2.2 But was technology really the cause?

Another, related, question is whether these reactions are a direct consequence of the introduction of eLT or whether they are actually a reaction to other changes going on in the university and the Society in which it is situated. I have touched on this more than once in previous chapters but I discuss the matter more thoroughly here.

Although it seemed to me that the reactions described by my interviewees were to the introduction of eLT and not to overall changes in Society or in HE, I did look at other possible causes of this unease. First, there have been huge changes in UK society in the last century. Two world wars and the invention of nuclear weapons, the decline of the influence of western religions, universal suffrage and the emancipation of women, universal education and numerous inventions which enable almost unlimited mass travel and communications and are just some of the factors which transformed life in the UK during the 20th century. More recently, there has been the various boom-bust economic cycles, the increased mobility of the labour market with its associated job insecurity, the nationwide pension crisis and the increased anxiety generated by the so-called 'war on terror'. In Higher Education, there has been massive changes too, including the increased number of universities and of students, funding mechanisms, changed employment arrangements management styles, all of which have been mentioned elsewhere in this thesis. Might some of these changes have been the actual cause of my interviewees' of concern over knowledge ownership, power shifts and privacy issues?

Clearly, it is conceivable that the general increase in surveillance in our society – enabled by technology and encouraged by the perceived terrorist threat – might be the cause of the teachers' concerns in this area, rather than the introduction of eLT. Likewise, job insecurities resulting from the increased flexibility of the job market and the phasing out of academic tenure might be

the root cause of teachers' concerns over power, control and authority. And the 'knowledge economy', where knowledge is bought, sold, lost and stolen just like any other commodity could be what is making teachers anxious over knowledge ownership. How can I be sure that it is the technology, not these societal changes, which are the causes of these anxieties I am studying?

My answer is that I cannot be sure — and in fact, that these changes may well be making my interviewees anxious as well. But my interview method encouraged them to talk freely (but solely) about their feelings regarding the advent of eLT in their working environment. None of them strayed far from this topic and all of them started discussing the anxieties I have described after some ten minutes or more of immersion in discussions of their use of the technology. These were not thoughts left over from previous conversations, or topics they had been reading or hearing about before they started talking to me, they were generated by focussed contemplation of the technology and their use of it. And I have no doubt that my interviewees were absorbed in our discussion: their body language, way of speaking, tendency to go well over their allotted time, and conclude with remarks such as "Goodness, I haven't enjoyed a discussion so much for ages", all pointed to interviewees focussed on the topic and revealing below-the-surface feelings about the subject matter.

The same argument applies to changes in the university environment. It would be possible to suggest that changes in North University since 1992 (when it changed its status), or the faculty restructuring which was to happen a couple of years later, or other such internal changes might have been the *real* cause of disquiet in my interviewees, rather than the advent of the VLE, but not one of my interviewees even implied this, nor expressed any anxiety about changes of this type. My interviews⁸⁴ came at time when North University was prosperous, successful and expanding (as it has been ever since). It was not shedding staff, slashing budgets or making sweeping changes to its staff's working lives. The only major changes at the time were all to do with the technology; staff's working practices were changing as a result of its introduction, and the changes were being discussed throughout its halls and corridors.

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⁸⁴ All of which, except for the three pilot interviews, were held at North University.

So, in summary, while technology may not have been the *sole* cause of the anxieties which surfaced during my conversations, there was a good deal of reason to believe that it was at least a *major contributory* cause. The conversations were allowed to roam freely, the interviewees because absorbed, animated and uninhibited as the conversations progressed and seemed to be freely expressing what they felt, and most of the remarks which I found most useful came from the second half of the sessions, when the interviewees had warmed to their themes – but no one started to talk about other possible cause of unease. No guarantees that the technology was the root cause, then, but plenty of indications that it was at least a significant factor.

10.2.3 What about the other stakeholders?

In my long journey from my first attempt to pose my research question, I have not forgotten the stakeholders (identified in Section 1.1.3 as students, managers, support staff; funding bodies, employers, parents and Society) who were my first concern. I have come to know more about university *teachers*' feelings, but I have not said much about how these feelings might affect these other stakeholders?

The answer is that my position has not changed as a result of this investigation. This is partly because I did not interview any other HE stakeholders as part of this research, and also because the concept of "stakeholders", which was much in vogue at the start of my study, seems to have fallen into disuse and almost nothing has been written about 'stakeholder satisfaction' since that time. ⁸⁵ I do address the matter of the potential effect of the responses identified in this research on society as a whole (see Section 10.6.3) and I summarise here my own views of how the responses identified in this thesis could affect the other stakeholder groups listed above.

Students

It seems self-evident to me that students will be adversely affected if their teachers are under stress over matters such as plagiarism, surveillance, diminished authority, trust and their allotted role. Students too may be

Chapter 10: Reflections

Apart from Grainne Conole's paper (Conole (2006)) on the collapse of the UKeU, where stakeholder satisfaction was a key theme.

concerned over some of these matters (in fact, many of the publications I read were focussed on student reactions to these topics) but the matter is unlikely to be ameliorated by teachers' own concerns.

Managers

The same applies to HE managers. As an ex-manager myself, it is my experience that happy, satisfied staff are much easier to manage than distressed ones. Also, as I point out in Section 10.5.3, other reforms, such as faculty reorganisations and relocation moving to open-plan offices are likely to be more difficult to implement in an atmosphere of role-confusion and mistrust, such as might be linked with the reactions to eLT I have discussed in this thesis.

Support staff

A similar argument is likely to hold for non-academic staff. It cannot be easy to apply personnel policies, impose financial constraints, run a computer support service or the like, in an atmosphere of some tension and mistrust.

Funding bodies

It is certainly not in the interests of the funding bodies for teachers to react negatively to eLT. A huge amount of money has been spent on its implementation and high hopes have been pinned on the transformational effects it will achieve. Some even hope for eventual financial savings as a result of its use so a less-than-enthusiastic response by teachers cannot be in the funding bodies' interests.

Parents/students' supporters

Again, it seems self evident that parents/supporters want the best for their students (and the best results from any money they have contributed) and will be unhappy if they sense that their student's experience, in the broadest sense, is not as good as it ought to be.

Employers

Employers are looking for a skilled well-educated workforce. If teachers (and, as a result, students) are ill at ease, it is possible that their teaching, and the students' learning, will suffer and the graduates will not be as skilled as they

would otherwise be. Also, if disenchantment leads to fewer HE teachers, there will be fewer skilled graduates for the workforce, which is not in employers' best interests.

Summary

The above are only my suppositions, based on my having been a student, parent, manager, administrator of university funds, member of a support team and employer of graduates myself, at various times. But if these suppositions hold true, as seems likely to me, then the responses to eLT identified in this thesis could have far broader repercussions than simply affecting a proportion of university teachers.

10.2.4 And the proper role of universities?

I have mentioned the proper role of universities in several places in this thesis: I describe the historical perspective in Chapter 1, the modern view in Chapter 2, and the views of a number of educationalists in Chapter 3 and this chapter. The total picture from all this is that the role required of universities by today's society has become even broader than that defined by Barnett and Dearing in 1977 (see 1.2.1) and added to by other educationalists over the following thirty years (see 3.2). Brenda Gourley says:

"education fuels sustainable development and a reliable way out of poverty; education is fundamental to working democracies and enlightened citizenship; education promotes social justice and an understanding that is essential to the peace and harmony — and even the continued life — of our species on this planet. Through education and the institutions of higher education — that is, colleges and universities — new and innovative ways are being found to meet not only the needs of the 21st century but also the rights of people to be educated. We have unlocked formidable new capabilities, and if we pay attention, we can solve many of the problems that confront us."

Challenging, indeed, especially as she sees this role to be a *world-wide* one: the UK HE sector has, in her view, a responsibility (jointly with those of other developed nations) to bring university education to all who want it, *anywhere in the world*.

Not all share Gourley's broad vision but she is certainly not alone. The idea behind the UK's e-university initiative, UKeU, was to offer UK courses to a worldwide market and the vision did not falter, only the mechanics of the implementation. And the University of Phoenix, for all its faults, cannot be faulted on its broadness of reach. It may exist only for profit but with its open admissions policy (students need the barest qualifications to be accepted), it boasts a current enrolment of almost half a million students, which is surely a contribution towards broadening participation. The University of Phoenix and UKeU may not be the best examples to hold up but many fine universities such as Harvard and the UK's Open University now make many of their courses available over the Web for anyone to read, on the principle that *learning* should be unfettered, even if degrees come at a price, which is a good start towards Gourley's vision.

In summary, it appears that a modern university's role is to do everything that universities have ever been required to do, and more; and to make this broad offering available to all who want it, anywhere. And eLT will be crucial to universities' ability to achieve this role, as emphasised by Gourley (*ibid*), Dunn 2003, Laurillard 2006, Langlois 2003 and many others.

10.3 Questions raised by the research

One of the tests recommended by Kvale for checking the validity of one's research is to ask whether it *feels* right, or whether there are apparent inconsistencies which are not explained by the data. There are, in fact, two inconsistencies which are puzzling me at this point: why did many of my interviewees say they loved eLT if they had all these concerns and why has no one else has noticed that eLT could be a mixed blessing for teachers?

This section addresses these questions and tries to ensure the balance of feelings reflected in this thesis is a fair representation of the total picture.

10.3.1 Why the contradictions?

The first apparent inconsistency is as follows: if these nineteen teachers had all these underlying concerns about eLT, why did so many of them still declare themselves to be enthusiastic eLT users at some point or other during their interviews? I checked the transcripts and none of them owned up to really hating the technology (although two of them clearly didn't like it very much).

Three said something like "Oh, I love it" or "I'm very enthusiastic", and fifteen seemed to use it quite extensively. So what was going on here?

Two ideas spring to mind. The first, which I've already talked about, comes from the way the "I love it" remarks were all near the beginning of the interviews, the reservations came later (when the speakers were more relaxed). I do think my explanation of this is plausible – that some people felt they *ought* to like the eLT, so they said they did, but later, when more relaxed, they let their guards drop and were more honest. There were several of reasons why they might feel they should like it: for example, the university was pushing eLT use very hard and many people like to be supportive of their managements' ideas. Furthermore, some circles see dislike of technology as rather 'stick-in-the-mud' or a sign of age, and in some circles expressing a dislike for technology is a bit like saying you don't actually like music or children – it's just not done.

An alternative possibility is that it's due to the way people *like* complaining; their first response gives the more accurate picture but after a while, they start coming up with complaints, because that is what many of us like to do.

However, there is really no reason to take these remarks as mutually exclusive. It is perfectly possible to like some aspects of the technology but not others or to *generally* like the technology but still have some concerns. Or even to like something despite feeling that it's bad for you. And none of these potential reasons for the apparent contradictions would invalidate the research. The aim was not to show that people *liked* eLT or they didn't, were *satisfied* with it or they weren't (as I had originally planned); it was to explore responses towards the eLT that people were experiencing, in all their diversity and complexity, and these conversations were excellent for enabling me to achieve that aim.

So, in conclusion, I think it is fair to say that most of the interviewees probably did like the eLT – some liked it a lot – but that they also had concerns and anxieties about it, at the same time; and that this conclusion in no way invalidates my investigation or its results.

10.3.2 So why has no-one noticed?

The second puzzle is that no one else really seems to have noticed that (some) teachers appear concerned about these aspects of eLT and that these concerns appear to be interlinked through issues of Trust and Identity. The technology is new (but not that new) and is being widely used (by some 80,000 academics in the UK, by some estimates) in an environment where people expect to question and analyse responses and reactions to anything new. Wouldn't everyone have noticed by now, if these concerns really do exist?

The main reason I would suggest is that research in Higher Education has been so strongly focussed on the needs of *students* that few people have even wondered about teachers' reactions, let alone researched them. There have been some (O'Donoghue 2006, Moron-Garcia 2006, Maguire 2005, Day *et al* 2006, and Kelchtermans 2005 & 2006, for example). However, many of these focus, like Day and Keltchermans, on school teachers, and do not consider responses to the use of eLT. Papers about teachers' feelings have been relatively rare across a broad range of HE-related research topics⁸⁶. Perhaps teachers are an unusually altruistic set of people (as evidenced by their choice of profession), too, and are used to putting the needs and concerns of their students before their own.

In addition, there *is* corroborative evidence of the individual elements of my conclusions. Studies have been done into teachers' "satisfaction" with the eLT, the effect of surveillance on teachers, the disempowerment effects of eLT and so on (see Chapter 3); there is just little or no research attempting to link it together in this way.

My final argument is that it was just *because* this seemed to be an underresearched area that I chose to investigate it in the first place, so it seems illogical to worry now that this paucity of corroborative evidence might cast doubt on my results. In short, once again I feel that this apparent contradiction can be explained in more than one, entirely plausible, way and need not cast doubt on the validity of my research.

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⁸⁶ Including investigations of bad behaviour, such as plagiarism

10.4 The world has not stood still

Introduction

This research was started in 2002 – some eight years ago – and much has happened in the intervening period. In particular, there have been significant changes in the technologies which together can be classed as eLT, during these years, and much more research has been done into themes which have bearing on my study. The former topic has been covered in Chapter 3 and the latter is addressed in this section.

Technological changes

The most significant changes in information technology which have had the potential to affect university teachers during the first decade of the 21st century has been the invention of an astonishing number of new ways to enable communication among and between university students and teachers. E-mails were a relatively new phenomenon to many university teachers at the beginning of the 21st century but now they are the most common form of written communication between and among in university teachers and students. Texting was generally only used between students, for social communication, whereas now it is extensively used by university staff for purposes as diverse as notifying students of changes in lecture times, to sending out examination results. Social networking (the use of facilities such as 'Facebook'), 'podcasting', 'second life', 'blogging' and 'twittering' were all relatively unknown activities when I started this investigation and were certainly not mentioned by any of my interviewees, but many of these are now in common use and therefore creeping in to teaching methods in many places.

When I reflect on these new tools, it seems to me likely that some of them may have been, like the VLE, both welcomed by many university teachers and the cause of some unease and stress to others (and even to the welcomers). Second life, for example, can entail its participants inventing a whole new persona for themselves and 'living', through this persona, in an entirely imaginary world. When a university course is also conducted largely in an electronic world (a VLE), especially if the course is a distance learning one, students can confuse – deliberately or accidentally – the two worlds and the

real and imaginary personae. This could lead to further feelings of deceit and mistrust among those trying to teach these students, as has already been noted by more than one researcher (Turkle 1996 & 2005, Dreyfus 2001; Poster in Murray 2003, and Joinson *et al* 2008, for example).

The proliferation of these new tools, none of which has been taken into account in this research, does not in any way compromise the results of this investigation. Had they all been in common use at the start of my study, I may well have still elected to study only the effect of the introduction of VLEs, emails and their supporting technology, the internet, because to do otherwise would have been to define too large a country to explore in the time available. However, this continued, and seemingly relentless, arrival of new eLT tools in the university teaching environment supports my belief in the importance of getting a better understanding of the effect of such changes on university teachers. If the internet, e-mails and VLE were the only new technologies, one feels that in time, teachers would adapt and learn to cope with the changes. But it is possible that the current rate of change is too great, and will last for too long, for this to happen without more understanding and support than appears to be offered to teachers at present.

10.5 Implications

The conclusions described in the previous chapter may lead to one or more of a number of consequences, few of them likely to be beneficial to HE teachers, their universities or the UK Higher Education sector as a whole. Implications related to design and selection of eLT itself, for Higher Education policy makers, for HE teachers and for their universities are all discussed in this section.

10.5.1 The technology

The most straightforward of the implications of this research concern the technology designers, vendors, procurers and implementers. From the conversations described in this report, it is clear that the stress-free introduction and proper use of e-learning technologies such as VLEs – current and future versions – will only be achieved if those who design, market, select and implement them take considerations such as those explored in this thesis

into account. Many of the fears which are inhibiting teachers' use of eLT could be resolved at this level. For example, eLT suppliers could incorporate privacy enabling technologies into their VLEs to prevent teachers' (and students') privacy being breached or to make such monitoring as overt (and hence non-threatening) as the recording of telephone calls has become in the world of telephone sales, help desks and call centres. Unless these reactions are fully explored and taken seriously, the full benefits which the technology might bring to the sector may not be realised and the sector (including the designers and vendors) will be the poorer for it.

10.5.2 Policy makers

The findings of this research also carry a message for the country's national and HE policy makers. The roller-coaster implementation of new technology into our universities has been so enthusiastically espoused by national and HE policy makers alike, partly as a result of the Dearing report (e.g. *Recommendation 41)* and partly in the expectation of consequent reductions in university running costs. However, the fact that this may lead to some disenchantment (and ultimate shortages) of university teachers and also to fundamental changes in the nature of UK universities which are discussed in Section 10.6.3, must be an unintended and unwelcome consequence.

10.5.3 HE teachers

The most important implications, however, concern the teaching profession itself. Firstly, if HE teachers become apprehensive about the technology being introduced into their working lives, they may ultimately respond in one of the following ways. They may fail to use the tools to best advantage, for example by avoiding putting the best of their work on to their VLE or web-site for fear of it being 'stolen' by their students or their peers, or its ownership claimed by their HEI and sold for the latter's profit. They may also lose a significant amount of enjoyment of, and satisfaction with, their work and hence, at the very least, teach less well or, at worst, leave the profession altogether (or, in the case of potential teachers, avoid joining the profession in the first place).

Furthermore, if the use of the technology engenders mistrust and questions of role and identity in HE teachers, they may again become disenchanted with teaching and other aspects of university life may be adversely affected too. For example, teachers may resist changes such as faculty re-organisations, pay restructuring schemes, HEI mergers, relocation of premises or changes in management practices which they might otherwise have accepted and which may have be in fact beneficial to themselves and their university.

10.5.4 Universities

Looking more broadly, if these fears over role and identity expressed by some teachers and researchers turn out to be well founded, the practice of HE teaching and the role of HEIs may change significantly as a consequence. For example, more than one of my interviewees suggested that in future, the HE teacher's role may be split into three parts: content developer (researcher/ writer), course designer (or procurer, if content is bought-in) and course deliverer (lecturer/presenter). The first and second of these roles would be distanced from the learners and from the course deliverers, who would in turn be distanced from the subject matter which they teach. This could have many unfortunate consequences. For example, a move to a smaller number of course 'suppliers', which should in theory benefit students at smaller/poorer/ less prestigious HEIs by enabling them to be taught to the same quality standards as, say, Harvard or Oxford students, would certainly reduce the diversity of subject matter taught, which would be contrary to most theories of good educational practice (for example, see Bottery 2004). Furthermore, the separation of course developers from learners would result in learning becoming 'supplier-driven' rather than 'student led' which again flies in the face of modern educational ideas (see Laurillard 2006:73, for example). In addition, teachers (now reduced to the role of 'course deliverers') would become more distant from their own disciplines, and thereby less able, or motivated, to pursue research interests or even to keep up with changes in their subject matter. Finally, universities would change from being centres of knowledge construction to being locations (in many cases, just virtual locations) of knowledge dissemination and teaching would revert to the 'delivery model' instead of students being party to the joint construction of meaning and discovery of new knowledge.

10.5.5 Summary

In summary, the implications I deduce from this research are that we are at risk of inadvertently changing the fundamental role and nature of our universities and of denuding them of the type of teachers which are taken as key to their (current) role and nature, unless policy makers, HEIs and even educational technology vendors pay some attention to the disquiet being caused to university teachers by some aspects of the new technologies which are being introduced into their working lives.

10.6 Has the research question been answered?

10.6.1 Introduction

My research question asks:

"How are UK university teachers responding to the increased requirement to use e-learning technology in their teaching methods, and how might these responses affect the Higher Education sector in this country? In particular, does the advent of eLT constitute a potential threat to the fundamental role and nature of universities or might it, conversely, help them to reassert their position as core elements of Society?"

Clearly, the bulk of my research has been focussed on answering the first part of this question – how are university teachers responding to eLT? – and answers have been found, considered and discussed, in Chapters 6 to 9 of this thesis. The remainder of this question, concerning the effect on these responses might have on Higher Education, has not been tested, and cannot realistically be tested, in the same way. However, it can be considered, in the light of the answers to the first question, and I lay the groundwork for such a consideration in Chapters 1 to 3 when I describe the study's *background* (including a discussion of the role of a university and e-learning's relevance to this), its *context* (including the HE and technological climate and the "information society" at the beginning of the 21st century) and what has been said on these matters in the *literature*. I also briefly outline, in Section 10.5, the implications which my findings may have on teachers and their HEIs. All these strands are brought together and discussed in this section.

10.6.2 The current status

A university's role

At the end of Section 1.2.1, I conclude that the expected role of a UK university in the 21st century is a combination of a number of previously recognised functions – including developing the 'whole person', knowledge creation and transfer, skills development, training the intellect, fostering democracy and teaching people to live together in society – plus some more modern concerns related to making universities' teaching available to all, regardless of gender, religion, status, wealth, disability, age or distance from a suitable HEI, all within the financial challenges of funding such educational provision in an age of financial constraint.

The relevance of eLT

Likewise, I conclude that eLT was expected to contribute to this multi-faceted role in a multitude of ways, including enabling the widening participation agenda (especially in regard to distance learners and those who work as well as study), the huge increases in student numbers, new pedagogies (student-centred, flexible, personalised), skills and knowledge development and, perhaps, the cost savings required from the sector.

The HE climate

I discuss in Section 2.3.1 the 'new vision' which has changed the nature of the Higher Education sector in the last few decades. Changes include: a huge increase in the number of universities (from around 22 to over 160 in less than two generations); greatly reduced government funding per student and the introduction of student loans and fees; increasing government intervention in university affairs; multiple quality assessment and performance measurement initiatives; new styles of HEI management (such as the much discussed "new managerialism"), new types of university (the Open University, the e-University, the University for Industry and the National Health University are all examples) and ideas like corporate sponsorship and inter-university trading of courses to enable universities to balance their budgets. Some HEIs have become universities rather than technical colleges, art colleges, or the like or merged to become a mega- university; others have reorganised into more, or fewer, units

and changed staffing arrangements along the way. In summary, there has been a period of immense turmoil in the HE sector with little sign of the pace of change reducing in the foreseeable future.

The technological climate in HE

Above all, the introduction of communications and information technology into every aspect possible of university life has transformed universities in a way which would have been impossible to imagine when many of its current teachers first entered the profession. E-learning, pioneered in the UK by the Open University almost 35 years ago, finally took off in the late 1990s when the Internet, VLEs and e-mails all became widely available in HE. Now, less than 15 years later, many universities require all their staff to offer their courses online, and hard on the heels of VLEs have come a host of other technologies (some of which are mentioned in Section 10.4) which university staff are now expected to master. In theory, eLT is supposed to make teaching easier, but few would say it is doing so yet.

The wider society

In Section 2.3, I discussed some of the changes affecting Society as a whole which might have relevance to this research. I concluded by noting that this study was carried out at a time when writers such as Castells and Turkle were identifying issues of power, status, identity and network technology, in relation to the flow of knowledge in Society, which could equally apply to the 'society' of an HEI, whose focus is knowledge creation and dissemination, and hence who may be particularly affected by changes to the way knowledge is handled.

The literature

Chapter 3 discusses the views and findings of other writers on these matters at the time of this research. Although most researchers feel that the impact of eLT on HE is, and will continue to be, very significant, their views on exactly what this impact is likely to be are diverse. Evidence has been shown of links between the introduction of eLT and trust, identity, surveillance, power and knowledge ownership issues (*inter alia*) but much of this work relates to eLT's effect on students; rather less attention has been paid to the impact which it can be expected to have on university teachers.

10.6.3 How might this change?

I reflect here on the significance of my research findings to the climate described in the previous section.

Many educationalists have pointed to ways in which eLT can enable universities to take a pivotal role in Society. For example, widening participation, lifelong and distance learning, through which we can offer Higher Education to anyone anywhere, all depend enormously on the successful implementation of eLT in our universities, and each of them is crucial to the new vision. Taylor et al 2005 argue that, through the widening participation agenda, the university system can move from being one that "cultivates the talents of the few" to one that "serves the interests of the many" and Dunn 2003 says that eLT is vital to making Higher Education available to all, regardless of any disability they may suffer. Similarly, Langlois 2003 says that universities must meet the needs of the knowledge-based society through "continuous retraining, learning opportunities tailored to individual requirements, and other lifelong learning practices" and that "ICTs are the answer" to being able to provide this. Above all, the whole of Brenda Gourley's "Dancing with History" (Gourley 2010) is an impassioned argument about how universities can and must change in order to transform Society, and that e-learning and the technologies which enable it are the key to it all.

However, I see potential threats to this new vision for Higher Education's central role in transforming Society in terms of a potential lack of teachers, a change in pedagogy (back to something more resembling a 'delivery mode' of teaching), a standardisation of what is taught across the HE sector, and the other possible effects which were described in Section 10.5. Gourley's vision cannot happen unless eLT is successfully implemented throughout HE teaching and learning, and "successfully" means without the threats which I have outlined above becoming a reality – that is, if teachers' feelings about eLT are not carefully taken into account.

And the feelings I discuss in this paper – loss of control and authority, privacy, knowledge ownership, sense of identity and trust – cannot be considered in isolation. To use Castell's expression, HE teachers' feelings must be studied from a "plural perspective" if they are to be properly understood.

10.7 Endnote

Research students frequently get asked – and indeed often ask themselves – "But what have you actually *found* at the end of all this work?" My methodology does not necessarily expect me to find anything (although of course, I could do so), it just requires me to gain a greater understanding of my 'country' and to tell an interesting story as a result, which should be accurate, rich in detail and full of insights. I believe that I have demonstrated this greater understanding and told this insightful story in the 270 pages of this thesis. However (to use my other metaphor), I contend that I have also contributed a few 'dots' to the impressionist painting which is being created by educational researchers about the state of Higher Education in an eLT-enabled world, and I summarise these here as follows.

- The university teachers whom I interviewed were generally enthusiastic about the introduction of educational technology into their working practices.
- They had, however, some concerns related to issues of control and authority, of privacy, surveillance and deceit, and of knowledge ownership.
- These feelings were not always overt; they were often only expressed after
 the interviewee had become more relaxed than at the start of the interview,
 and were often signaled by a change in voice or body language.
- These responses may be linked with overall feelings of lack of trust (in authority, colleagues, students, technologists or the technology) and lack of clarity over a UK university teacher's proper role and identity in Higher Education in the 21st century.
- Like Castell's network society, Higher Education has become "a world which can only be understood and changed from a plural perspective" that brings together diverse elements such as cultural identity, networking, trust, power and control, and attitudes to the modern e-learning technologies

And we must strive to understand this Higher Education world, for the sake of our universities, all their stakeholders and the New Society which they could help to create.

- AAUP (2004) *Academic Freedom and Electronic Communications:* Downloaded on 9/9/10 from www.aaup.org/AAUP/pubsres/policydocs/contents/electcomm-stmt.htm .
- Abson, C. (2003), "The changing picture of higher education" in E. Oyston, (ed) *Centred on Learning*, Aldershot, Hants, UK: Ashgate Publishing.
- Almeda, M. B. & Rose, K. (2000) "Instructor Satisfaction In University of California Extension's On-line Writing Curriculum", *Journal of ALN* **4**(3).
- Anon (2006) Why students plagiarise. Article on the official web site of the University of Technology, Sydney. Downloaded on 2/9/06 from www.iml.uts.edu.au/assessment/plagiarism/why.html.
- Arvan, L. & Musumeci, D. (2000) "Instructor attitudes within the SCALE efficiency projects", *Journal of ALN* **4**(3).
- Ashworth, P.D., Bannister, P. & Thorne, P with members of the MA Policy and Professional Studies programme (1997) "Guilty in whose eyes? University student's perceptions of cheating and plagiarism", *Studies in Higher Education*, **22** (2):187-203.
- Ayris, P.(2005) Student IPR/Copyright in UCL. D/d on 2/8/06 from http://www.grad.ucl.ac.uk/.
- Bacsish, P. & Ash, C. (2000) "Costing the lifecycle of networked learning: documenting the costs from conception to evaluation", *A LT-J* 8(1): 92-102.
- Barlow, J.P. (1996) *Selling Wines Without Bottles*. Downloaded on 1.11.06 from http://homes.eff.org/~barlow/EconomyOfldeas.html.
- Barnett, R. (1990) The Idea of Higher Education. Buckingham: Open University Press.
- Barnett, R. (1997) *Higher Education: A Critical Business*, Buckingham: Society for Research into Higher Education & Open University Press.
- Barnett, R. (2003) Beyond all Reason: Living with Ideology in the University, Buckingham: Open University Press.
- Barnett, R. (2004). "The purposes of higher education and the changing face of academia", *London Review of Education*, **2**(1), 61-73.
- Barnett, R. (2005) (ed) Reshaping the university: new relationships between research, scholarship and teaching, Buckingham: SRHE and Open University Press.
- Barthes, R. (1975) S/Z (translated by R. Miller), London: Jonathon Cape.
- Bayne, S. (2002) "Mutability, metamorphosis and education in cyberspace" Paper given at conference entitled *Ideas in Cyberspace Education*, Higham Hall, UK. Downloaded on 22.10.06 from www.malts.ed.ac.uk/staff/sian/pdfs/ice1.pdf.
- Bayne, S. (2005) "Deceit, desire and control: the identities of learners and teachers in cyberspace" in R. Land and S. Bayne (eds.) *Education in Cyberspace*, London: RoutledgeFalmer.
- Bayne, S. (2006) "Temptation, Trash and Trust: the authorship and authority of digital texts" in *E-Learning* **3** (1).
- Bayne, S. & Land, R. (2000) "Learning in the Labyrinth: Hypertext and the Changing Roles of Instructor and Learner in Higher Education" in J. Bourdeau and R. Heller (eds) *Ed-MEDIA 2000: Proceedings of 12th Annual World Conference on Educational Multimedia, Hypermedia and Telecommunications.* Virginia: Association for the Advancement of Computing in Education.

- Becher, T. & Trowler, P. (2001) Academic tribes and territories: intellectual enquiry and the cultures of disciplines (2nd edn). Buckingham: Open University Press.
- Beck, J. & Young, M. (2005) "The assault on the professions and the restructuring of academic and professional identities: a Bernsteinian analysis" *British Journal of Sociology of Education* **26**(2), pp. 183–197.
- Becker, G.S. (1996) *Accounting for Tastes*, Cambridge, MA:Harvard University Press.
- Bentham, J. (1962) "Panopticon; or the inspection-house" in J. Bowring (ed) *The works of Jeremy Bentham*, New York: Russell and Russell.
- Berge, Z L (1996) The Role of the Online Instructor/Facilitator. Downloaded on 05.09.06 from http://jan.ucc.nau.edu/~mpc3/moderate/teach_online.html.
- Betts, K S. (1998). "Why Do Faculty Participate in Distance Education?" *The Technology Source*, Oct.
- Birkerts, S (1995). *The Gutenberg Elegies: The Fate of Reading in an Electronic Age.* Winchester: Faber and Faber.
- Bottery, M. (2004) 'The Impact of Standardisation and Control', in The Challenges of Educational Leaders hip. London: Sage.
- Boyer, L.M. (2010) Plagiarism in Cyberspace: Sources, Prevention, Detection and Other Information, CSUS Library Services web page, downloaded on 20/8/10 from http://library.csustan.edu/lboyer/plagiarism/plagiarism3bibliog.htm.
- Britain, S. & Liber, O. (2004) A Framework for the Pedagogical Evaluation of Virtual Learning Environments, JISC commissioned review. Downloaded on 12/5/06 from www.ijsc.ac.uk/uploaded documents/VLE%20Full%20Report%2006.doc.
- Brown, R. & Piatt, W. (2001) Funding Widening Participation in Higher Education: a discussion paper. Downloaded on 12/9/10 from https://www.ippr.org/.
- Burbules, N.C. (2002). "Like a version: Playing with online identities". *Educational Philosophy and Theory*, **34**(4): 387-393.
- Burkert, H. (1994) "Electronic Trust" and the Role of Law: A European Perspective', in K. Brunnstein and E. Raubold (eds.), *Applications and Impacts Information Processing '94 (Proceedings of the IFIP 13th World Computer Congress,* Hamburg, Germany, 28 August-2 September), Volume II, North Holland: Elsevier.
- Campbell, D. & Condor, C (1987) "Surveillance, computers and privacy" in R Finnegan *et al* (eds) *Information Technology: Social Issues*. London: Hodder & Stoughton.
- Carroll, J. (2007) A Handbook for Deterring Plagiarism in Higher Education. Oxford Centre for Staff and Learning Development, Oxford Brookes University.
- Carroll, J. & Appleton, J (2001) *The Good Practice Guide to Plagiarism*, JISC. Downloaded on 23/1/02 from: www.jisc.ac.uk/pub01/brookes.pdf.
- Carroll, J. & Peperel, H. (2002) "The impact of electronic detection software in averting or identifying student plagiarism. Paper at symposium *Improving Student Learning Theory and Practice 10 years on* under the theme "Student Cheating and Plagiarism".
- Castells, M. (2000) *The Information Age Economy, Society and Culture.* Oxford, Blackwell Publishers.
 - a Volume I The rise of the network society
 - b Volume II The power of identity
 - c Volume III End of millennium.
- Castells, M. (2004) *Informationalism, Networks, and the Network Society: a Theoretical Blueprinting.* Northampton, MA: Edward Elgar.

- Castells, M. (2005) *The network society : a cross-cultural perspective*. Oxford: Blackwell. Downloaded on 1/9/10 from http://docs.google.com/.
- Chang, H. (2005) Producing Original Research through an Undergraduate Course, Final Project Report. Downloaded on 12/9/10 from http://explorer.cekli.com/articles/pdf/hasok-chang.
- Chowaniec, J. (2005) "Exploring Identity", *Teaching in Higher Education* **10**, 2 (April), pp 265-70.
- Christe, B. (2003) "Designing Online Courses to Discourage Dishonesty" in *Educause Quarterly* **26** (4)pp 54-8. D/d from www.educause.edu/ir/library/pdf/EQM0348.pdf on 2/8/10.
- Clegg, S. (2005) Academic identities under threat?, *Presented at British Educational Research Association annual conference*, September 2005.
- Clegg, S., Hudson, A. & Steel, J. (2003) "The Emperor's New Clothes: Globalisation and e-learning in Higher Education", *British Journal of Sociology of Education (BSE)*, Vol. 24 No. 1 (pp40-53).
- Clegg, S., Hudson, A., & Mitchell, A. (2005) "The personal created through dialogue: enhancing possibilities through the use of the new media. *ALT-J, Research in Learning Technology* Vol. 13 No. 1 (pp. 3-15).
- Cogdell, B., Matthew, R.G.S. & Gray, C. (2002) "Academic Cheating: An investigation of Medical Students Views of Cheating on a Problem Based Learning Course. Paper at symposium *Improving Student Learning Theory and Practice 10 years on* under the theme "Student Cheating and Plagiarism".
- Collins, M. & Berge, Z 1996. "Facilitating Interaction in Computer-Mediated Online Courses". Presentation at the FSU/AECT Distance Education Conference, Tallahasee. Downloaded on 12/8/06 from http://star.ucc.nau.edu/~mauri/moderate/flcc.html.
- Collison, G., Elbaum, B., Haavind, S. & Tinker, R.(2000) Facilitating On-Line Learning: Effective Strategies for Moderators. Madison, WI: Atwood.
- Compayré, G. (1908) *Michel de Montaigne and the Education of Judgement*. London: George Harrap.
- Conole, G. (2002) "Review of JTAP Projects". University of Southampton, Research and Graduate School of Education.
- Conole, G. (2002b) "The Evolving Landscape of Learning Technology". *ALT-J* **10**(3):4-18.
- Conole, G. (2006) "Managing differences in stakeholder relationships and organisational cultures in e-learning development lessons from the UK e-university experience". Studies in Continuing Education 28 (2): 135-150.
- Conole, G. & Oliver, M. (1998) "A pedagogical framework for embedding C&IT into the curriculum", *ALT-J* **6**(2), pp 4-16.
- Cooper, Aldwyn (1980) "Computer-based Learning at the Open University and the CICERO system" in R. Lewis & E. Tagg (eds.) Computer Assisted Learning: scope, progress and the limits. Amsterdam: North-Holland Publishing.
- Cousin, G. (2005) "Learning from cyberspace", in R. Land and S. Bayne (eds.) *Education in Cyberspace*, London: RoutledgeFalmer.
- Crawford S. & Stucki L (1990), "Peer review and the changing research record", *J Am Soc Info Science*, **41**, pp 223-228.
- Cutright, M. (2000) Book Review in Higher Education 40: 489-494.
- Davies, J. & Pigott, N. (2002) *E-Learning in UK Higher Education* downloaded on 30/8/10 from http://auavisit.open.ac.uk/elearningaua/pdf.
- Davis, B.G. (1993) Tools for Teaching. San Francisco: Jossey-Bass Publishers.

- Davis, S.F., Grover, C.A., Becker A.H. & McGregor, L.N. (1992) "Academic dishonesty: prevalence, determinants, techniques and punishments", *Teaching of Psychology*, **19** (1):16-20.
- Dawson, S. (2006) The impact of institutional surveillance technologies on student behavior" in *Surveillance & Society* **4**(1/2): 69-84. D/d on 8/8/2010 from www.surveillance-and-society.org/Articles4(1)/student.pdf.
- Day, C., Kington, A. Stobart, G & Sammons, P (2006) "The personal and professional selves of teachers: stable and unstable identities" *British Educational Research Journal* (32(4): 601-616.
- Dearing, R (1997) Higher Education in the Learning Society: Report of the National Committee of Enquiry into Higher Education, London: HMSO and NCIHE Publications. Downloaded on 12/8/10 from: www.leeds.ac.uk/educol/ncihe/.
- Deem, R. (1998). "New managerialism in higher education the management of performances and cultures in universities" *International Studies in the Sociology of Education* **8**(1):47-70.
- Deem, R. (2001) "Globalization, new managerialism, academic capitalism and entrepreneurialism in universities; is the local dimension still important?"
- Deem, R. & Brehoney, K. (2005) "Management as Ideology: the case of 'new managerialism' in Higher Education" *Oxford Review of Education* **31**(2): 213–231
- Deem, R., Hillyard, S. & Reed, M. (2007) (eds) *Knowledge, Higher Education and the New Managerialism: The Changing Management of UK Universities.* Oxford, Oxford University Press.
- Denzin, N.K. & Lincoln, Y.S. (1994) Handbook of Qualitative Research London: Sage.
- DfEE (1998). *Higher Education for the 21st Century: Response to the Dearing Report.*Downloaded on 8/6/10 from www.lifelonglearning.co.uk/dearing/index.htm.
- DFES (2003) The Future of Higher Education. London: HMSO.
- Dewey, J. (1916) Democracy and Education. New York: Macmillann.
- Donnelly, M., Ingalls, R., Morse, T.A., Castner, J. & Stockdell-Giesler, A.M. (2006) "(Mis)Trusting Technology that Polices Integrity: A Critical Assessment of Turnitin. com" *Inventio* **1**(8) D/d from http://doit.gmu.edu//inventio/issues/Fall_2006/Donnelly_3.html on 12/9/10.
- Dreyfus, H.L. (1996) The *Current Relevance of Merleau-Ponty's Phenomenology of Embodment*. D/loaded from http://ejap.louisiana.edu/EJAP/1996.spring/dreyfus.1996.spring.html on 5.11.06.
- Dreyfus, H. L. (2001) On the Internet. New York: Routledge.
- Dubrovsky, V., Kiesler, S. & Sethna, B (1991) "The equalisation phenomenon: status effects in computer mediated and face to face decision making groups", *Human-Computer Interaction*, **6**: 119-136.
- Duderstadt, J.J. (2002) "The Future of Higher Education in the Knowledge-Driven Economy of the 21st Century". Paper to the 175th Anniversary Symposium, University of Toronto downloaded from http://milproj.ummu.umich.edu/publications/toronto on 17/05/06.
- Duderstadt, J.J. & Wulf, W (eds.) (2002). *The Impact of Educational Technology on the Future of the Research University*. Washington, DC: National Academy Press.
- Dunn, S. (2003) "E-learning in UK further and Higher Education" in *Return to SENDA?* Implementing accessibility for disabled students in virtual learning environments in UK further and higher education. Downloaded on 8/11/05 from www.saradunn.net/VLEreport/section05.html.

- Du Preez, A. (1999) "Learner embodiment in cyberspace: Morphing towards cyberlearners", *Progressio: Journal of the Bureau for University Teaching*, 21(2). [21.2.04,] www.unisa.ac.za/Default.asp?Cmd=ViewContent&ContentID=13435.
- Elton, L. (2004) "Continuing Professional Development in Higher Education: Trust and Accountability", *Higher Education Digest* 49, Digest Supplement, pp. 5-7.
- Evans, J (2000) "The New Plagiarism in Higher Education: From Selection to Reflection", *Interactions* **4** (2). Downloaded on 1/1/02 from: www.warwick.ac.uk/ETS/interactions/vol4no2/evans.htm .
- Everard, J. (2000) *Virtual States: The Internet and the Boundaries of the Nation-State*. London: Routledge.
- Flaherty, D.H. (1997) "Controlling surveillance: can privacy protection be made effective?" in *Technology and Privacy: the new landscape*, P. E. Agre & M. Rotenberg (eds) Cambridge MA: Cambridge University Press.
- Flint, A., Clegg, S, & Macdonald, R. (2006) "Exploring Staff perceptions of student plagiarism" in *Journal of Further and Higher Education* **30**(2) (May) pp. 145-156.
- Ford, M. (1998) Surveillance and Privacy at Work. London: IER.
- Foucault, M. (1977) *Discipline and Punish: T(1987)he Birth of the Prison* (trans. Alan Sheridan), New York: Vintage.
- Franklyn-Stokes, A & Newstead, S. E. (1995) "Cheating: Who does what and why?", *Studies in HE*, **20**, pp 159-172.
- Fredericksen, E., Pickett, A. & Shea, P. (2000) "Factors influencing faculty satisfaction with asynchronous teaching and learning in the SUNY learning network", *Journal of ALN* **4**(3).
- Freewood, M., Macdonald, R. & Ashworth, P. (2002) "Why simply policing plagiarism is not the answer". Paper at symposium *Improving Student Learning Theory and Practice 10 years on* under the theme "Student Cheating and Plagiarism".
- Freire, P. (1970) *Pedagogy of the Oppressed* (20th Anniversary Edition, 2000), New York: Continuum Publishing.
- Gates, B. (1996) The Road Ahead. London: Penguin.
- Giddens, A. (1984) *The constitution of society: Outline of a theory of structuration.* Cambridge: Polity Press.
- Giddens, A. (1991) *Modernity and Self-Identity: Self and Society in the Late Modern Age*, Cambridge: Polity Press.
- Gladney, H.M. (2000) "Are Intellectual Property Rights a Digital Dilemma? Controversial Topics and International Aspects", *Information Impacts Magazine*, Feb 2000.
- Goodfellow, R. & Lea, M. (2007). *Challenging E-Learning in the University: a Literacies Perspective.* Maidenhead & New York: Open University Press.
- Goodyear, P. (1999) "New technology in higher education: understanding the innovation process" in *Integrating Information and Communication Technology in Higher Education*. A. Eurelings *et al*, eds. Kluwer: Deventer 107-136.
- Goold, B.J. & Neyland, D.eds (2009) New Directions in Surveillance and Privacy. Oxon: Willan.
- Gourley, B. (2010) "Dancing with History: A Cautionary Tale" *EDUCAUSE Review*, **45**, (1): 30-41.
- Graham, S. & Marvin, S. (2000) Splintering networks, fragmenting cities. Urban infrastructure in a global age. London: Routledge.

- Gunawardena, C.N. (1992) "Changing faculty roles for audiographic and on-line teaching", "American Journal of Distance Education, **6**(3):58-71.
- Harris, S.(2005) "Rethinking academic identities in neo-liberal times". *Teaching in Higher Education* **10**(4):421-433.
- Hartman, J., Dziuban, C. & Moskal, P. (2000) "Faculty satisfaction in ALNs: dependent or independent variable?". *The Journal of ALN* **4**(3). Downloaded on 12/6/04 from www.aln.org/alnweb/journal/jaln-vol4issue3.html.
- Harvey, L. (1999) "New Realities: the relationship between higher education and employment". Keynote presentation at the *European Association of Institutional Research Forum*, Lund, Sweden. Downloaded on 17/10.06 from www.uce.ac.uk/crg/publications/cp/eair99.html.
- Haywood, J., Anderson, C., Coyle, H., Day, K., Haywood, D. & Macleod, H. (2000) "Learning Technology in Scottish higher education a survey of the views of senior managers, academic staff and 'experts'", *ALT-J* 8 (2): 5-17.
- Hegel, G. (1967) *Philosophy of the Right* (1821). Oxford: Oxford University Press.
- Helman, C.G. (1996) "The application of anthropological methods in general practice research", *Family Practice* **13**, *Suppl.1*: S13-S16.
- Henkel, M. (1997) "Academic values and the corporate enterprise", *Higher Education Quarterly*, **51**, pp. 134–143.
- Henkel, M. (2000) Academic Identities and Policy Change in Higher Education, London: Jessica Kingsley.
- Henkel, M. (2001) "Policy change and Academic Identities", Paper to a UCL "*Debates in HE*" lecture, 6/11/01. D/d from www.ucl.ac.uk/cishe/seminars/dhe-papers/MHpaper.doc on 8/1/06.
- Henkel, M. (2004) "Current Science Policies and their Implications for the Formation and Maintenance of Academic Identity", *Higher Education Policy*, **17** (2):167:182.
- Henkel, M. (2005) Academic identity and autonomy in a changing policy environment, *Higher Education*, 49, pp. 155–176.
- Hislop, G. & Atwood, M. (2000) "ALN teaching as routine faculty workload". *Journal of ALN 4*(3).
- Hodgson, V.E., Mann, S.J. & Snell, R. (eds) (1987) *Beyond Distance Teaching Towards Open Learning Milton Keynes, England*: Society for Research into Higher Education & Open University Press.
- Hoffman, J. (2008). "I know what you did last math class." New York Times, 4/5/08.
- Holborn, H. (1953) "History and the Study of the Classics", *Journal of the History of Ideas*, Downloaded on 6/8/10 from www.jstor.org/pss/2707494.
- Hollands, N. (2000) (ed.) *Creating a Virtual Learning Community*, **2**(1) Raleigh: North Carolina Community College System. Downloaded on 12/8/10 from http://www.nccei.org/blackboard/testingadvice.html.
- Holley, D. & Oliver, M. (2000) "Pedagogy and the new power relationships", *International Journal of Management Education* **1** p1p1-21.
- Howarth, R. (1975) 'Preface' in S/Z, London: Jonathon Cape.
- Hummel, C. (1994) "Plato" in *Prospects: the quarterly review of education* **24** 1/2:329-42 Downloaded on 6/8/10 from www.ibe.unesco.org/publications/ThinkersPdf/platoe.pdf.
- Jaffee, D. (1998) 'Institutionalized Resistance to Asynchronous Learning Networks', Journal of ALN 2 (2).

- Jameson, J., Ferrell, G., Kelly, J., Walker, S. & Ryan, M. (2006) "Building trust and shared knowledge in communities of e-learning practice: collaborative leadership in the JISC eLISA and CAMEL lifelong learning projects. *BJET* **37**(6): 949-968.
- Jameson, J. & Andrews, M. (2008) "Trust and Leadership in the Learning and Skills Sector" *CEL Research Report*, Centre for Excellence in Leadership: Lancaster University.
- Jarvis, P. (1999) The Art of Learning. London: Kogan Page.
- Jawitz, J. (2009) "Academic Identities and communities of practice in a professional discipline" in *Teaching in Higher Education*, **14** (3) p241-251.
- Jennings, N. (1995) *Teacher Learning from Policy: cases from the Michigan Reading Reform.* New York: Teachers College Press.
- Jocoy, C. & DiBiase, D. (2006) "Plagiarism by Adult Learners Online: A case study in detection and remediation", *The International Review of Research in Open and Distance Learning* **7**(1).
- Joinson, A.N. (2005). "Deviance and the Internet: New Challenges for Social Science" (ed.). Special issue of *Social Science Computer Review* **23** (1).
- Joinson, A.N., Hancock, J. & Briggs, P. (2008) "Secrets and Lies in Computer-Mediated Interaction: Theory, Methods and design" *CHI 2008 Procedings-Workshops (April 5-10, 2008, Florence, Italy)* Downloaded on 11/9/10 from www.portal.acm.org/ft_gateway.cfm?id=1358975&type=pdf.
- Joinson, A.N. (2005) "Does your VLE virtually undress its users?" *Times Higher Education*, September 15 2006. Downloaded on 12/9/2010 from www.timeshighereducation.co.uk/story.asp?storyCode=205417§ioncode=26.
- Jones, C. (2005) "Nobody knows you're a dog", in R. Land and S. Bayne (eds.) *Education in Cyberspace*, London: RoutledgeFalmer.
- Jones, C., Asensio, M. & Goodyear, P. (2000) "Networked Learning in Higher Education: practitioners' perspectives". *ALT-J*, **8**(2): 18-28. Downloaded on 8/8/10 from http://repository.alt.ac.uk/328/.
- Kashy, E., Thoennessen, M., Albertelli, G. & Tsai,Y. (2000) "Implementing a Large On-Campus ALN Faculty perspective", *Journal of ALN 4* (3).
- Katz, J., Rice, R., & Aspden, P. (2001). The Internet, 1995-2000: Access, civic involvement and social interaction. *American Behavioral Scientist*, **45**(3), 405-419.
- Kay, J. (1993) Foundations of Corporate Success: How Business Strategies Add Value. Oxford: OUP.
- Kelchtermans, G. (2006) "Teachers vulnerability: understanding its moral and political roots" *Cambridge Journal of Education* **26**: 307-323.
- Kelchtermans, G. (2005) "Teachers' emotions in educational reforms: Self-understanding, vulnerable commitment and micropolitical literacy", *Teaching and Teacher Education* **21**: 995-1006.
- Kerr, C. (1963) The Uses of the University. Cambridge MA:Harvard University Press.
- Knight, P. & Harvey, L. (1998) "Staff Satisfaction". Perspectives 3 (2):56-62.
- Krsak, A. (2007) "Curbing Academic Dishonesty in Online Courses" in *TCC 2007 Proceedings* pp159-70. Downloaded on 12/8/10 from http://docs.google.com/.
- Kuehn,L. (2008) Surveillance 2.0:The "Information Panopticon" and Education. D/d on 12/8/10 from www.policyalternatives.ca/.../Our Schools, Ourselves/10 Kuehn surveillance 2.pdf
- Kvale, S. (1996) *InterViews: An Introduction to Qualitative Research Interviewing.* London: Sage Publications.

- Lambert, E. G., Hogan, N. L. & Barton, S.M. (2003) "Collegiate Academic Dishonesty Revisited: What have they done, how often have they done it, who does it and why did they do it?", *Electronic Journal of Sociology* **7**(4), downloaded on 28.11.06 from www.sociology.org/content/vol7.4/lambert_etal.html.
- Land, R. (2005) "Embodiment and risk in cyberspace education", in R. Land and S.Bayne (eds.) *Education in Cyberspace*, London: RoutledgeFalmer.
- Land, R. & Bayne S. (1999) "Computer-Mediated Learning, Synchronicity and the Metaphysics of Presence", In P. Kommers & G. Richards (eds), *Proceedings of the World Conference on Educational Multimedia, Hypermedia and Telecommunications* 1999 (pp. 736-741). Chesapeake, VA:AACE.
- Land, R. & Bayne S. (2002) "Screen or monitor? Issues of surveillance and disciplinary power in online learning environments". In C Rust (ed.) *Improving Student Learning Using Learning Technologies*, Oxford: OCSLD. Downloaded on 7/12/05 from www.malts.ed.ac.uk/staff/sian/surveillancepaper.htm.
- Langlois, C. (2003) Facilitating Lifelong Learning in Universities: The Role of ICTs. Presented at the Round Table "education and Knowledge Societies", WSIS, Geneva 10/12/03. Downloaded on 12/9/10 from www.iau-aiu.net/he/icts/rtf/icts_paperwsis.rtf.
- Laurie, S.S.(1880) "Montaigne as an Educationalist" in *Frazer's Magazine* (July) *pp* 60-72.
- Laurillard, D. (1993) Rethinking University Teaching: a Framework for the Effective Use of Educational Technology. London: Routledge.
- Laurillard, D. (2000) "New technologies, students and the curriculum: the impact of communications and information technology on Higher Education" in P.Scott (ed) *Higher Education Reformed* London: Falmer Press.
- Laurillard, D. (2002) "Rethinking Teaching for the Knowledge Society" *Educause Review,* (Feb), reprinted in M. Devlin, R. Larson and J Meyerson (eds) "The Internet and the University: Forum 2001", *Educause,* 2002. Downloaded on 3.11.06 from www.educause.edu/ir/library/pdf/ERM0201.pdf.
- Laurillard, D. (2006) "E-Learning in Higher Education" in P. Ashwin (ed) *Changing Higher Education*. Oxon: RoutledgeFalmer.
- Laurillard, D. (2008) Digital technologies and their role in achieving our ambitions for education. London: Institute of Education publication.
- Leibniz, G.W. (1991) *Discourse on Metaphysics and Other Essays*. Tr. Roger Ariew & Daniel Garber. Cambridge: Hackett.
- Lowe, C. (2006) Issues Raised by Use of Turnitin Plagiarism Detection Software. Downloaded on 12/9/10 from http://www.cyberdash.com/plagiarism-detection-software-issues-gvsu.
- Luck, M. (2010) "Interaction in Communication Technologies and VLEs: Human Factors" in *Surveillance in the Virtual Classroom*, ed Angela T. Ragusa (Charles Stuart University, Australia) pp.160-169.
- Lyon, D. (2006) *Theorizing Surveillance: The Panopticon And Beyond* Cambridge: Polity Press.
- Lyotard, J.F. (1984) *The Postmodern Condition: A Report on Knowledge*, Manchester: Manchester University Press.
- Maguire, L.L. (2005) Literature Review Faculty Participation in Online Distance Education: Barriers and Motivators Downloaded on 12/8/10 from www.westga.edu/~distance/ojdla/spring81/maquire81.htm.
- Manning, P. K. (1982) "Analytic Induction" in R.B. Smith & P.K. Manning (eds.) *Handbook of Social Science Methods: Qualitative Methods*. Cambridge, MA: Ballinger

- Mason, R. (2002) "E-learning and the eUniversity", ALT Policy Board, Birmingham.
- May, C. (2000) A Global Political Economy of Intellectual Property Rights: The New Enclosures?, RIPE series, London: Routledge.
- May, C. (2002) The Information Society. Oxford: Polity.
- McGowan, U (2005) Educational Integrity: A Strategic Approach to Anti-Plagiarism. Presentation to Asia Pacific Educational Integrity Conference, Dec 2005. D/d on 10/8/10 from www.slidefinder.net/e/educational_integrity_strategic_approach_anti/5251826.
- McKenna, C. (2001) "Introducing computers into the Academic process: what is the impact on academic practice?" Paper given to the *Higher Education Close Up Conference* 2, Lancaster University, 16-18 July. Downloaded on 12/8/10 from www.leeds.ac.uk/educol/documents/00001805.htm.
- McKenna, C. (2005) "Words, bridges and dialogue: issues of audience and addressivity in on-line communication", in R. Land and S. Bayne (eds.) *Education in Cyberspace*, London: RoutledgeFalmer.
- McLuhan, M. (1962) The Gutenberg Galaxy. Toronto: University of Toronto Press.
- McLuhan, M. (1964) *Understanding Media: The Extensions of Man*, London: Routledge, Kegan and Paul.
- McWilliam, E. & Taylor, P.G. (1998) "Teacher Im/Material: Challenging the New Pedagogies of Instructional Design". In *Educational Researcher* **27**(8) pp. 29-35.
- Miles, M.B. & Huberman, A.M. (1994) Qualitative data analysis: An expanded sourcebook. London: Sage.
- Miller, S. I. (1982) "Quality and quantity: another view of analytic induction as a research technique", *Quality and Quantity* **16**:281-295.
- Milton, J. (1670) "Of Education" in R.W. Griswold (1847) ed. *The Prose Works of John Milton* Philadelphia (PA):John W Moore. Downloaded on 6/8/10 from http://oll.libertyfund.org/?option=com_staticxt&staticfile=show.php%3Ftitle=1874.
- Mitchel, W.J. (2003) *ME++ The cyborg self and the networked city.* Cambridge, MA: MIT Press.
- Montaigne, M. (1588) "Of the Institution and Education of Children" quoted in G. Compayré (1908) *Michel de Montaigne and the Education of Judgement.* London: George Harrap.
- Moran, C. & Hawisher, G. (1998) "The rhetorics and languages of electronic mail" in I. Snyder (ed) *Page to screen: taking literacies into the electronic era.* London: Routledge.
- Morgan, C.J. (1994) *Plagiarism: Does it matter?* Downloaded on 08.03.05 from www.canberrac.act.edu.au/library/plagiarism.
- Morley, L. (2001) "Subjected to review: engendering quality and power in higher education" *Journal of Educational Policy*, **16** (5): 465-478.
- Morley, L. (2003) *Quality and power in higher education*. Maidenhead: Open University Press.
- Moron-Garcia, S. (2008) "What Lecturers Say Helps and Hinders Their Use of a Virtual Learning Environment to Support Face to Face Teaching" in J. O'Donoghue (2006) (ed) *Technology Supported Learning and Teaching: A Staff Perspective*. Hershey, PA: Idea Group Inc.
- Mulgan, G.J. (1991) Communication and control: networks and the new economies of communication. New York: Guildford Press.
- Mumford, L. (1964) "Authoritarian and Democratic Technics", Technology and Culture 5 (winter):pp 1-8.

- Mumford, L. (1971) *The Pentagon of Power*, vol 2 of *Myth of the Machine*, London: Seeker and Warburg.
- Murray, S.J. (2003) "Network Digital Information Humachines: A Conversation with Mark Poster" first published in *Qui Parle*, **14**(1): 1–19; downloaded on 1.10.06 from http://philosophy.utoronto.ca/documents/cvs/works/1133974469.pdf.
- Napper, B. (2005) *Computer 50: The Mark 1 Story.* Downloaded on 12/9/10 from http://www.computer50.org/.
- Newman, J.H. (1852) *The Idea of a University, Preface and Discourse 5* downloaded on 22/05/06 Aldershot, Hants, UK: Ashgate Publishing.
- Newmarch, J. (2000). "Who owns University Web Courseware?" Downloaded on 25.11.06 from http://jan.netcomp.monash.edu.au/ausweb00/paper.html.
- Noble, D.F. (2002) "Digital Diploma Mills: The Automation of Higher Education". Toronto: Aakar Press. D/d from http://communication.ucsd.edu/dl/ on 10/8/10.
- O'Donoghue, J (2006) (ed) *Technology Supported Learning and Teaching: A Staff Perspective*, Hershey, PA: Idea Group Inc.
- Oliver, M. (2001) "Evaluating online teaching and learning", *Information Services and Use* **20**(2/3):83-94.
- Oliver, M. (2002) "What do learning technologies do?", *Innovations in Education and Training International* **39**(4):245-52.
- Oliver, M. (2005) "Metadata vs educational culture: roles, power and standardisation", in R. Land and S. Bayne (eds.) *Education in Cyberspace*, London; Routledge-Falmer.
- O'Neill, O. (2002) *A Question of Trust: The BBC Reith Lectures*, Cambridge: Cambridge University Press. D/d from www.newmanreader.org/works/idea/preface.html on 12/8/10.
- Oyston, E (2003) (ed) "Centred on Learning". Aldershot, Hants: Ashgate Publishing.
- Paechter, C. (2001) "Schooling and the ownership of knowledge" in C. Paechter, M. Preedy, D. Scott & J. Soler (eds) *Knowledge, Power and Learning*, London: Paul Chapman.
- Panteli, N. (2005) *Trust in Global Virtual Teams*. Downloaded on 17/12/05 from www.ariadne.ac.uk/issue43/panteli/.
- Patrick, J. (1973) A Glasgow Gang Observed, London: Methuen.
- Pelletier, C. (2005) "New technologies, new identities: the university in the informational age", in R. Land and S. Bayne (ed.) *Education in Cyberspace*, London: RoutledgeFalmer.
- Phillips, M. & Geroimenko, V. (2004) Multi-User Collaborative VRML Learning Environment; A Dream Building: a Diagram of a Mechanism of Modern Learning. D/d on 12/8/10from www.mike-phillips.net/pdf/panopticon.pdf.
- Pidgeon, N. (1996) "Grounded theory: theoretical background", in Richardson, J. E. (ed.) *Handbook of Qualitative Research methods for Psychology and the Social Sciences*, Leicester: British Psychological Society.
- Plato (1910) "Meno" in E. Rhys (ed) Five dialogues of Plato bearing on poetic inspiration. London: J M Dent.
- Pollicino, E. B. (2000) "Challenges Facing Higher Education for the New Century: the impact on promotion and tenure in LIS education". Paper presented to the *National Conference of the Association for Library and Information Science Education*, San Antonio, Texas. D/loaded on 17.09.06 from www.alise.org/nondiscuss/con00 Pollicino.htm.

- Poster, M. (1990) *The Mode of Information: Poststructuralism and Social Context.* Cambridge: Polity.
- Poster, M. (1995) The Second Media Age, Cambridge: Polity.
- Poster, M. (2001) What's the matter with the Internet? Minneapolis: University of Minnesota Press.
- Pupius, M. (2001) "Achieving Excellence in Education and Higher Education" From a presentation to the Society for Research into Higher Education Conference, Cambridge, 12-14 Dec 2001.D/d on 2/3/03 from www.ihf.bayern.de/beitraege/2002_1/1-2002%20Steed.pdf.
- Raab, C. (2003) "Trust, Technology and Privacy", *Ends and Means* **13**(1) Downloaded on 7/12/05 from www.abdn.ac.uk/philosophy/endsandmeans/vol3no1/raab.shtml .
- Reid, M. (2005) Essential Copyright & IPR for Graduate Students. D/d on 12/08/06 from http://www.grad.ucl.ac.uk/.
- Reid, M. (2008) ECP-2006-DILI-510001 NEEO: First Report on IPR Issues. D/d from http://docs.google.com/viewer?a=v&q=cache:qhsXRaEi2DwJ:www.neeoproject.eu/IPRtoolkitPublic.p df+Martin+Reid+Essential+Copyright+IPR on 12/8/10.
- Rhem, J. (2001) "Tomorrow's Teaching and Learning: not hardware or software, but the hard (soft) touch". *National Teaching and Learning Forum Newsletter*, **10** (3).
- Rhoades, G. (1997) Managed Professionals: Restructuring Academic Labor in Unionized Institutions. Albany, NY: State University of New York Press.
- Richardson, J.T.E. (1996) Handbook of Qualitative Research Methods. Leicester: BPS books.
- Riegelsberger, J., Sasse, A. & McCarthy, J. (2005) "The mechanics of trust: A framework for research and design", *Int. J. Human-Computer Studies* **63** *p.*381-422.
- Robins, K. & Webster, F. (1987) *The Dangers of IT & the Responsibilities of Education* in R. Finnegan *et al* (ed) *Information Technology: Social Issues.* London: Hodder & Stoughton.
- Rogers, D. (2000) "A Paradigm Shift: Technology Integration for Higher Education in the New Millennium". In *Educational Technology Review* **19** (Spring Issue).
- Russell, B. (1992) An Enquiry into Meaning and Truth. London: Routledge.
- Saussois, J-M., Larsen, K., Lundvall, B-A. & Hargreaves, D. (2000) *Knowledge Management in the Learning Society.* Paris: Organisation for Economic Cooperation and Development.
- Schifter, C. C. (2000) "Faculty Participation in Asynchronous Learning Networks: A Case Study of Motivating and Inhibiting Factors" *Journal of ALN* **4** (1):15-22.
- Schiller, F. (1789) *Poet of Freedom Vol II*, tr. by Caroline Stephan & Robert Trout. D/d on 6/6/2010 from www.schillerinstitute.org/transl/Schiller essays/universal history.html.
- Schwartz, P.M. (1999) "Privacy and Democracy in Cyberspace", Vanderbilt Law Review **52** 6: 1609-702.
- Sikes, P. (2005, March 15). "Working in a "new" university: Pressures and possibilities". Paper presented at *Economic and Social Research Council (ESRC) Teaching & Learning Research Programme Seminar Series "Changing Teacher Roles, Identities & Professionalism" –Seminar 2: Professional Identities and Teacher Careers, King's College, London. Downloaded on 23.10.06 from www.kcl.ac.uk/content/1/c6/01/41/56/programme.pdf.*
- Sikes, P. (2006) "Working in a 'New University': in the shadow of the RAE?" *Studies in Higher Education* **31**(5): 555 568.

- Sikes, P., Measor, L. & Woods, P. (1985) *Teacher Careers: Crises and Continuities*. Lewes: Falmer.
- Silverman, D. (1997) *Qualitative Research; Theory, Method and Practice.* London: Sage.
- Silverman, D. (2006) Interpreting Qualitative Data. London: Sage.
- Simpson, H. & Perry, J. (1999) Academic Freedom, Privacy, Copyright and Fair Use in a Technological World. D/d from www.lattc.edu/lattc/aca_sen/academic_freedom.htm on 4/3/05.
- Smith, G (2010) "MA in Surveillance Studies: course overview" From London City University web site. D/d on 12/8/10 from www.city.ac.uk/sociology/surveillance/.
- Smith, H. & Oliver, M. (2002) "University teachers' attitudes to the impact of innovations in information and communications technology on their practice" in C. Rust (ed.) *Improving student learning through learning technology*, Oxford: OCSLD.
- Sosabowski, M., Herson, K. & Lloyd, A. (1998) "Identifying and overcoming staff resistance to computer based learning and teaching methods: shedding millstones to achieve milestones", *Active Learning* **9**: 26-30.
- Star, C. & Hammer, S. (2008) "Teaching generic skills: eroding the higher purpose of universities or an opportunity for renewal?" *Oxford Review of Education* **34**(2).
- Steel, J. & Hudson, A. (2001) "Educational technology in learning and teaching: the perceptions and experiences of teaching staff", *Innovations in Education and Teaching International* **38** (2):103-111.
- Stefani, L. & Carroll, J (2001) *A Briefing on Plagiarism*, York: Learning and Teaching Support Network (LSTN) Genesis 3.
- Strauss, A. (1987) *Qualitative Analysis for Social Scientists.* Cambridge: Cambridge University Press.
- Strauss, A.L. & Corbin, J.M. (1990) Basics of Qualitative Research: Techniques and Procedures for Developing Grounded Theory. London: Sage.
- Sutherland-Smith, W. & Pecorari, D (2010) *Policy and practice in two academic settings: How the administrative structures of Australian and Swedish universities serve a culture of honesty* Presentation on 5/7/10 to "Conference 2010" on plagiarism at Newcastle Business School. Downloaded on 20/8/10 from https://www.plagiarismadvice.org/documents/conference2010/007/Plagiarism%20Conference%202010/Tuesday/PS2%20-%2012%20noon/DianeandWendyPS2.ppt.
- Symon, G. & Cassell, C. (1988) "Analytic Induction", Qualitative methods and analysis in organisational research: a practical guide". London: Sage.
- Taylor, G., Mellor, M. & Walton, L. (2005) "The Politics of Widening Participation" D/d on 12/9/10 from www.c-sap.bham.ac.uk/ALAC/CommunityInvolvement/wideningparticipation.html.
- Thomas, G. & James, D. (2006) "Reinventing grounded theory: some questions about theory, ground and discovery". *British Educational Research Journal* **32**(6):767-95.
- Thomas, W.I. & Thomas, D.S (1928) *The child in America: Behavior problems and programs*. New York: Alfred A Knopf.
- Thompson, G. (2000) "Rampant Referencing: Is there no control?" Paper to the TEDI *Effective Teaching and Learning* conference, Queensland University. D/d on 1.2.04 from www.tedi.ug.edu.au/conferences/teach_conference00/papers/thompson.html.
- Toffler, A. (1970) Future Shock. London: Pan Books.
- Toffler, A. (1980) The Third Wave. London: Collins.
- Trowler, P. (1998) Academics Responding to Change: New HE Frameworks and Academic Cultures. Buckingham: SHRE/Open University Press.

- Trowler, P., Saunders, M. & Knight, P. (2003) "Change Thinking, Change Practices". York: Learning and Teaching Support Network (LTSN).
- Turgeon, A., Biase, D. D. & Miller, G. (2000) "Introducing the Penn State World Campus through certified programs in Turfgrass Management and Geographic Information Systems". *Journal of ALN* **4** (3).
- Turkle, S. (1987) "Computers and the Human Spirit" in R. Finnegan *et al* (ed) *Information Technology: Social Issues*, London: Hodder & Stoughton.
- Turkle, S. (1996) Life on the Screen: Identity in the Age of the Internet. London: Phoenix.
- Turkle, S. (2005) *The Second Self: Computers and the Human Spirit*, New York: Simon & Schuster.
- UCL (2006a) Information about Learning Technology: Legal Guidelines What is copyright? D/d on 1.1.06 from <a href="https://www.ucl.ac.uk/learningtechnology/legal/copyright/co
- UCL (2006b) *Information for Staff: Resources UCL Copyright Policy.* Downloaded on 8.11.06 from http://www.ucl.ac.uk/staff/resources/copyright-policy.
- Unwin, A. (2007) "The Professionalism of the higher education teacher: what's ICT got to do with it?" In *Teaching in Higher Education* **12**(3) pp 295-308.
- Usher, R. (2001) "Research as story telling: a post-modern approach" in C.Paechter, M. Preedy, D. Scott and J. Soler (eds) *Knowledge, Power and Learning,* London: Paul Chapman.
- Usher, R. & Edwards, R (2000) "Lost and found: "cyberspace" and the (dis)location of teaching, learning and research", *Research, Teaching and Learning; Making Connections in the Education of Adults*, Papers from the 28th Annual SCUTREA Conference, UK. D/d on 12/8/09 from www.leeds.ac'uk/educol/documents/000000742.htm.
- Van Bentum, M. (2001) Attitude of academic staff and [managers to electronic publishing and the use of distributed document servers on university level: a survey report D/d from http://cf.uba.uva.nl/en/projects/arno/workpackages/arnowp7-survey.rtf on 3.11.06.
- Waismann, F (1967) "Wittgenstein und der Wiener Kreis" in B. F. McGuiness (ed) *Shorthand notes of F Waismann.* Oxford: Basil Blackwell.
- Waldo, J. Lin, H.S. & Millett L.I. (eds) (2007) *Engaging Privacy and Information Technology in a Digital Age.* (Committee on Privacy in the Information Age, US National Research Council). Washington, DC; National Academies Press. Downloaded on 1/6/10 from www.nap.edu/catalog.php?record_id=11896.
- Warschauer, M. (2000) *Electronic Literacies: Language, Culture and Power in Online Education.* Mahwah, N.J.: Lawrence Erlbaum Associates.
- Webster, F. & Robins, K. (1989) "Plan and Control: Towards a Cultural History of the Information Society", *Theory and Society* **18**, 3 (May); p. 339.
- Whitty, M.T. & Joinson, A.N. (2008). *Truth, Trust and Lies on the Internet*. New York; Routledge.
- Winkworth, I. (2000) "Innovative UK Approaches to Measuring Service Quality". Paper presented to *ARL Measuring Service Quality Symposium*, Washington, D.C. D/d on 23.09.06 from www.arl.org/libqual/events/Oct2000msq/papers/Winkworth/winkworth.htm.
- Wittgenstein, L (1968) Philosophical Investigations. Oxford: Basil Blackwell.
- Wooldridge, A. (2005) "The Brains Business" *The Economist:* (Sep 8th). Downloaded on 12/9/10 from http://www.economist.com/opinion/PrinterFriendly.cfm?story_id=4339960.
- Zuboff, S. (1998) *In the Age of the Smart Machine: The Future of Work and Power.* Oxford: Heinemann Professional.

Glossary

1. Terms

E-learning

Laurillard (2006:1) says that "a student who is learning in a way that uses information technology and communication technologies ... is using e-learning" and goes on to define e-learning as "the use of any of the new technologies or applications in the service of learning or learner support" (*ibid*:20); together, these two statements, define the way "e-learning" is used in this thesis.

Virtual Learning Environment (VLE)

A virtual learning environment is a software system designed to support teaching and learning in an educational setting (as distinct from a Managed Learning Environment (MLE) where the focus is on management). It may also be seen as a set of online tools and resources that facilitate various aspects of the online education experience, including creation and communication of course content, assessments and information and document sharing.

E-learning technology (eLT)

The term should be taken to mean virtual learning environments, electronic mail (e-mail) and internet search engines. On occasion, and only where so mentioned in the text, related technologies such as hand-held internet-access devices have also been included within the meaning of the term.

2. Acronyms

eLT e-learning technology

C&IT, ICT or IT Communications and Information Technology

DfEE Department for Education and Employment

DfES Department for Education and Skills

HE Higher Education

HEI Higher Education Institution (e.g. a university)

IPR Intellectual Property Rights

PC Personal Computer

QAA Quality Assurance Agency

RAE Research Assessment Exercise

UCL University College London

UKeU United Kingdom e-University

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Annex A Cast list

The following is a list of the interviewees who feature in this thesis. All names are fictitious, assigned in alphabetical order according to the sequence in which the interviews were conducted (Adam was interviewed first, Brigit second and so on) but the brief details about each interviewee which are included here to help the reader visualise who is speaking when interviewees are quoted, are as the subjects described themselves.

Name	Role (as described by the interviewee)	Sex	Age
Adam	Teacher, subjects related to education	Male	20-35
Brigit	Teacher, subjects related to education	Female	20-35
Carl	Teacher, subjects related to education	Male	51-65
Derek	Teacher, 'business-related' subjects	Male	51-65
Edmund	Teacher, subjects related to education	Male	36-50
Fenella	Teacher, subjects related to sport/leisure	Female	21-35
George	ELT Project Manager "and an Academic"	Male	36-50
Helen	ELT Research Assistant "and an Academic"	Female	21-35
lan	Teacher, subjects related to the built environment	Male	36-50
Justin	Teacher, subjects related to food & beverages	Male	36-50
Kevin	Teacher, subjects related to food & beverages	Male	51-65
Leonard	Teacher, subjects related to sports & leisure	Male	51-65
Matthew	Teacher, subjects related to food & beverages	Male	51-65
Nigel	Teacher, subjects related to food & beverages	Male	51-65
Olivia	Teacher, subjects related to sports & leisure	Female	21-35
Percy	Teacher, subjects related to science & maths	Male	36-50
Quentin	Teacher, subjects related to science & maths	Male	36-50
Roger	Teacher, subjects related to science & maths	Male	51-65
Stanley	Teacher, subjects related to science & maths	Male	51-65

Annex A Cast List

Annex B Example interview transcript

Preamble;

The following is a transcript of exactly what was said during my interview with Percy, except for the text in square brackets, which has been anonymised. In addition, the colour coding and notes I made on this transcript during its analysis are shown. The following points of explanation may make the text and annotations clearer.

- 1. The words spoken by me are italicised whereas Percy's are in normal type.
- 2. The interview had started with Percy and me introducing ourselves to each other, followed by me reiterating the objective of my research and the session's 'rules of engagement', and asking whether he still wanted to be interviewed and was happy with the session being recorded⁸⁷. After he had confirmed that he did and was, I turned on the tape recorder.
- 3. By chance, both Percy and I had recently attended some sessions of a conference on e-learning which was taking place in a nearby university, as can be seen by a couple of references of the type "as we heard yesterday".
- 4. During my analysis, I marked portions of text in this transcript which seemed to relate to potential themes, using the following colour codes:

Yellow – control

Blue – knowledge ownership

Green – surveillance

Pink – other

5. In common with many of my interviews, the first half of this conversation was not particularly germane to the focus of my research, but is nonetheless included here, primarily for completeness. It does, however, establish the context within which his later remarks are made (for example, that he is an experienced ELT user but does not use the university's recommended VLE because he prefers one which he and his close colleagues had developed themselves).

Percy Thu 11/09/03 10:30 School of Science & Maths, male, 36-50

Would you like to tell me about how you use educational technologies, how you feel about them and how that makes you respond?

OK. Well I'll do my best but it's a fairly wide-ranging question, of course. First of all, as you know, at [this university] the main vehicle for delivering e-learning, the recommended vehicle, is Blackboard and there are a variety of views about that. I mean it's not just Blackboard, any virtual learning environment suffers, I think, from the same disadvantages, and I think depending on what background you're coming from you may or may not find one of these useful. I can see the benefits because, for the majority of people, they neither have the talent nor the time to develop anything like that themselves and so it fits their needs perfectly.

There's a bit of background for ourselves. I'm in the Maths Division of the School of Science and Maths and we've been using internet-delivered mechanisms of teaching for quite a long time. We certainly had one in 1996. So, you know, we've got a bit of a history of doing this and it evolves. So, you know, when Blackboard was introduced here we already had a system of delivering materials and a variety of interactive learning tools in place. So clearly we were reluctant to put all that aside and take on Blackboard. So I think that, given there's that history to it, we as a group haven't taken up Blackboard because, in our view, we can do everything Blackboard offers and more in our own way. It's not, in a sense, a learning environment; it's not, probably - that doesn't really describe what we do. But what we have got is a system of delivering materials - so, for example, every module we teach has some web page which is automatically generated. A certain amount of information is available via a database so that information is just delivered in that way. If staff choose to, they can also create a web page which has access to all the materials they wish to provide so those might be lecture notes, tutorial notes, other downloads, links to other sites, whatever it might be. Other people simply want to use the web as a means of delivering learning support materials so, as I understand it, Blackboard can also provide a technique where you just drop a local file from your computer into some page on Blackboard and therefore you're uploading your materials to somewhere on the Blackboard site. Well our way of doing that is simply through FTP so our staff will have a local folder in their computer and they just save a file to that folder and then it's available through FTP. And our tool would then provide access to that for the students. Another major development is, as you probably know, Progress Files are being introduced throughout all Higher Education and I believe there's a deadline of 2005 for this to be introduced on all courses. But this will be the third year now we've been running this. We've developed a system of allowing students to develop an online Progress File. So it's a fairly comprehensive system now because it's been evolving all the time, so with this being the third year, what it consists of is three parts really. One is, well basically a learning diary so they fill in a weekly entry for each module that they take and they are given guidance as to what it should consist of so, for example, they are told that they should be reflecting on what they've done so far, identifying any problems that they have come across, discussing what they've done about those problems as well as describing what work they've done in each module. So basically the idea is that they provide evidence of reflection, that's the main thing, but also a record of what they've done. This is available for staff to view. So, for example, staff can see what the problems are for each of their modules much more quickly than they would if they had to wait until the next staff-student meeting and also they get credit for that. You know, they need a bit of a carrot and we give them some credit points towards one particular module for each year. So that seems to

We had already covered all this in a previous e-mail exchange, but I reconfirmed these details, face to face, with each interviewee prior to the start of their interview.

have worked quite well, and obviously you get a range of views from the student point of view about that. Some of them think it's a good thing. Some only think it's a good thing at the end when they've been asked to review what they've done and then they say "Oh, yes, well maybe there was some value in this after all". Quite a lot of them say "I don't see why I should do this. It's got nothing to do with mathematics" but you know, it's the normal range of opinion, I think. So we've been doing that, partly because we think it's a good thing to do, partly because we actually get some useful feedback from it and partly because we are told we have to do it! So all of those things, you know

So that's one part of it, their learning diary, the second part is a portfolio which is the aspect where they are meant to keep a collection of work that they do and to deal with this we actually get them to create a web site so that they are developing some useful skills along the way. So the idea there is that they're given guidance as to what the web site should consist of – for example, the first thing they get around to do is to put their CV on there, and then they add materials for each of their modules as they go through the year. And they're meant to describe what they are putting on as well. I mean, ideally what we'd like to see is a record of all the work they've done on there, along with some description that they've provided and their thoughts about it. That hasn't actually been achieved by very many students because it's asking rather a lot but on the whole, they do pretty well. They're given complete freedom about design of the things so they've got some primitive control. We provide them with the tools and techniques to do it so they find that quite useful, I think, and we certainly find it useful. I mean, if they go for job interviews for placements for their third year, they can refer to their web site. They can say to a potential employer "This is evidence of what I've done". So, you know, I think it's worked quite well. As I say we've done two full years now. We've tried to analyse the results to see if there is any evidence to show that it helps them to perhaps be reflective, helps their communication skills, that sort of thing. Those are all the sort of things we're trying to encourage. It's quite difficult to actually get an objective measurement of this. It's not very easy to find a way of, you know, well basically to find a measure of how you can do that. But on the whole it looks as if, subjectively, it looks as if they are doing quite well so for example the people who have done it for two years look as if they are doing it much more effectively than the people who have just started. You know. And although there isn't a lot of data to play with yet, it's showing signs of doing so. There's quite a lot of data for a year. When I said "not a lot of data" I mean time-wise, we've got about 35 students on each year so it's manageable, and each of them are meant to do it each week for each of their 8 modules so altogether we've actually got about 4,000 comments for each year. So, you know, the collection of data in that sense is quite good. But how you analyse it is another matter! I mean, I don't know how you'd take information presented texturally and find some way of automatically processing it. So I've done a few things like looking for key words out of Bloom's Taxonomy, for example, just as a really crude guide. And, you know, because it's so crude, you're not really sure how much weight you should put on any results you get from it.

Um, I'm straying from the point a bit here. Anyway the point is we have tools such as that which we are able to design – and I'd say there's a key point here, that we can design these things here ourselves, and if we decide, having reviewed what we've done this year, that we want to include other features, we have the ability to then modify the system like writing the necessary code to adapt the system accordingly. So our greatest argument, if you like, for doing it this way is flexibility, and the fact that we are in control of that. Um, you wouldn't be able to do something like that through Blackboard; what you have to do is link to something like that from a Blackboard site. Um, but within Blackboard itself, obviously the big thing is, you are constrained by what it offers so with any Virtual Learning Environment, that's one of the problems. But its great advantage is: for most people, it meets what they need. So you know,

there's a bit of a tension there because on the one hand the institution would like to see everything done in a uniform way, but at the same time, if that means backtracking for one area, they're not going to be happy about doing that. I mean, we wouldn't be happy if we had to adopt that approach, but I've got nothing against the system as a whole, it meets most people's needs. But we do need flexibility to be able to offer, in our view, more than that. As far as delivery of other learning materials is concerned, it's really entirely up to the individual member of staff then, because we've done a range of interactive tools but I mean, those are always done in response to a specific need so if you are teaching a particular course or a particular module you can identify that, in order to get a particular point across, you know, you are down to that level really, you want to teach a particular idea, and so there might be an appropriate interactive tool that would help students learn that particular idea. And that's the way we've approached it, so when there's been a need for one, we can put on something, I mean, it would probably not help to describe the specific things there because, unless you know what it involves, it won't mean a lot, but you get the idea. You know. So it's really in response to a perceived need from the staff point of view. And of course it does mean that we have to have the skills to do that, but we've got the skill set necessary so we can develop those things on demand.

Um. I think as a group we are quite close, we work very closely together, you know there's not very many of us in Maths, there's only about 10 or 11 people, staff, and so it's much easier to work together as a group, it's not like you're trying to do something for the whole institution, you know, so I can see the differences there. So that's the way we've adopted. The approach we've adopted. I mean, there's always a bit of tension. I mean, what we do is clearly for our internal students. We just, probably about 2 years ago now, we had a bit of a run in with marketing people, as a result of that we weren't allowed to show any of this outside. So whatever we do has to be for our own internal students only. It doesn't mean to say that any students can't access it from outside but it's only, you know, they have to log in for example, to access the materials, we're not allowed to show it to all and sundry. I think it wasn't so much protecting our intellectual property rights, which is what you might have thought that would be all about, it's more to do with the corporate look and feel of the thing, you know, they weren't happy about that. It doesn't matter to us particularly because we only want, this is only intended for our own students anyway, so that's fine, but it did involve a bit of extra work in, you know, protecting the stuff.

So, in a nutshell really, that's where we're at. I don't know whether you want to discuss it further .. you did talk about my thoughts and feelings about these things. I think people do tend to adopt fairly rigid postures on these matters. I mean, I've been to one or two meetings where I've heard all sorts of things said about various learning environments, and I think people have a lot of trouble with Blackboard. I mean I can't speak from my own personal experience, I'm only reporting what I've heard other people say, there've been big problems with trying to get questionnaires on it, people have had difficulty getting it to work and, I mean I've got no direct evidence of this, it's just what I've heard people say.

I don't actually mind which tool it is, I'm not trying to compare Blackboard to yours or anything like that, I'm more interested in, whatever technology you use, how you, ... how you <u>feel</u> about it. For example, whether some days you think "Oh, I don't want to do all that stuff, why can't I just teach without it?" Or "I just couldn't manage without it nowadays". Or something.

OK. Yea, well we do do that, too, sometimes! I think we adopt an approach where we don't want the technology to take over. The technology in all its forms is very integrated with the way that our degree course operates. In a sense we've had to do it that way because of the nature of students we recruit. We certainly aren't in competition with the sort of Ivy League universities teaching mathematics, because

they're operating in an entirely different field and got a different group, a different type of person, they want, they are much more able to think theoretically. Our students are much more practical so we have to develop techniques which allow them to do useful things in their area of study but use the technology to help them do it. So basically the whole idea is that it's integrated throughout, whether it's hand-held devices like pocket calculators for example, or laptop computers or software or the internet, in all those areas there are ways in which those tools can help you learn mathematics. And indeed everything else I guess. But we've tried to integrate it wherever possible so that our classes, for example, might consist of standard presentations where you put across material using conventional techniques, you know, in a lecture, supported by learning technologies. You know, you'll have your ... um ... you know, data projector showing your presentation or showing your examples on line while you are lecturing on that material. But then of course the students have to actually have a go at that themselves. So it's incorporated in a variety of ways there. There are difficulties of always relying on it to work when you want it to work, so that a number of my colleagues get very frustrated when they go well prepared for a class and then it doesn't work and so you've got all the problems associated with that. And there's also the thought that you don't want it to take over. That students do still want to see a face and the idea that they could basically teach themselves with sufficiently sophisticated learning materials presented on line, I don't think it would receive much support, either from the students or from the staff. I can see why there might be the thought on the part of certain university administrators that it might be a good idea, because clearly a naïve thought would be "it's cheaper", but unfortunately it might only work with students that were sufficiently able, who basically could teach themselves whatever system they used. In most cases our students require quite a lot of support, and while it might be OK to provide them with say on line access to certain learning materials, they still need quite a lot of help face-to-face or through e-mail. Email has been quite a successful communication tool. Students use it very much they're used to using it - and it's good for us in the sense that we can reply, not necessarily when we feel like it but it gives us a bit more control over when to respond, you don't have to do it on demand, like if they telephoned you or knocked on your door, so it's been really, that's worked quite well, we do that extensively. It is also very good for communicating with the whole group so where you've got to share some piece of information or knowledge with the entire group, that works very well. We're looking at using, I think you've got other people who've said this as well, using mobile phone technology, SMS messaging. The trouble with that is that it's not free. E-mail's free and it's very easy to send out bulk messages in that way. SMS messaging can be done, I think there are all sorts of services offering you so many free messages a month or something but it's unlikely to be immediately useful to us, that. Unless the university is prepared to pay for the cost of the call, which I imagine they are not going to be too happy about! It would be quite good because students are used to doing this. These days students are all text messaging each other so to receive a text message. you know, would be quite normal for them. But we have looked into it, we have tried it, it really hasn't at the moment been very successful so we're sticking to the e-mail for now. And you can automate e-mail messages quite easily so it can all be done as part of your work package so if they say "I want this information to be e-mailed to me", they can click a button and it'll happen, automatically. So it can be integrated quite nicely into the rest of the system. So that's quite good.

So I think the main problems from the students' point of view are where to turn to for help when they get stuck. That seems to always be the case. So we've tried to provide what we can on line: we've got for example a Maths help facility so if they need more support materials they are all there, but there has to be a bottom line where, if none of that is any use, they need to be able to find a way of contacting a person. We do have, every day, sessions for two hours in the ground floor of this

building, where you came in, and it's staffed, there's a person there and anybody who wants help just goes along. That's run for anybody in the institution and it's paid for out of the university's widening participation budget, so I think, we're hoping to expand that, that's one area which we feel has been quite successful, but that doesn't deal with the technology part of things. But it's all part of the package that's offered.

One of the things that they were talking about at the conference was that teaching and learning is actually a social experience, for both the teachers and the learners, whereas if you are doing too much via the technology, you lose that social aspect. How do you feel about that?

Well, at the moment of course we haven't gone down the path that some courses have done of cutting down contact time to an absolute minimum. We do still have reasonable amounts of contact time; each student probably gets about 12 hours a week – if they choose to take it that is – with staff in classes. So I don't think we've found the contact thing a big problem. I mean students on the whole, increasingly so, are having to work as well as study, and so you often find them working odd hours, ... they do miss classes for those reasons, not just because they are still in bed, but because they are actually working to earn money to support themselves, so that seems to be an increasing problem. I mean I can tell, because I keep a record of when people log in to our site, that the times are, you know it's not, you know if I kept a graph they wouldn't be, there'd be a peak during the day but there's significant numbers of people logging in at all times. So clearly they're working on this late in the evening and in the early morning.

But didn't students always do this? I used to start work about midnight and, it wasn't logging in then, it was just my work but it was after I came home from that day's party! If you'd not drunk too much!

Too true! But there's also another aspect to the social side. You said students feels they need more contact, they want to see the tutor more. Do you think the tutors feel this is important too?

Oh, yes, absolutely. I think that most people you ask, from the staff point of view, would say they find that it would be much better to meet the students than try to interact with them through some electronic medium or any other way. But really it depends on the students coming to us for help. I mean we do have, as I've mentioned to you before, we can identify problems, and the system that we've got, if there's a problem there, the student's typed in "I've got a problem with this" there's a link which a member of staff can click on and directly type in a response. So that, um, simplifies the process but at the same time, you still need to see them. I think sometimes you don't really understand, you know, it becomes more obvious what the student problem is if you do actually see them, interact face to face, sometimes you try to infer from what they've written what the problem is and it's not so easy, you're only getting half the story, that sort of thing, so seeing them face to face I think is very important and I'm sure most of my colleagues would agree with that. And I don't think we've got any plans to cut down on that, but of course, year upon year, budgets are tightened, so some departments respond by simply cutting down the hours. And so far we've been able to resist that but I'm not sure how far that can go. Because it's a year on year reduction.

Another thing we talked about at the conference is changes in staff-student status. Do you think it's now more democratic because you can say, "go and look on the web, don't than just take my word for it"? Someone, I can't remember who, was saying that, you know, teachers could feel a change of status, they're not the guy who knows it all anymore...l.

Well I can't say that that's been a, well I can't say that I've felt that but I do know some others who've mentioned it. I think the students always turn to you as first line of support – sometimes too often – you know, you'd rather they did try and research a problem before coming to you with a question. I think mostly it's the opposite way round. They come to you first and then you have to say "Well look, have you tried looking here first?" because, as we are told, our role isn't just to teach them, it's to help them learn, teach them how to teach themselves. They've got to learn how to learn and a lot of them are very poor at doing so. So I wouldn't say that our, I forget the word you used, that our "status" has diminished in that respect. One problem which is a bit ... is that it's more difficult to trust what they've done as being their own work, you know this problem of plagiarism is becoming a real problem.

Is it?

Yea. The last few years the number of cases has risen quite rapidly. This may be because staff are more aware of this and it's easier to check to see whether material has been copied because you can copy sections of their work and put it into a search engine to see whether it's been taken from somewhere. People are more aware of this but the fact is, it's happening and students aren't really responding to the, in fact we do tell them quite clearly what they are and are not allowed to do but they don't appear to take it on board. The numbers of people who clearly copy from the internet and copy from each other is on the rise.

Mmm. And maybe particularly in Maths because it's not an essay subject and if you just want to get a perfect answer you can go to a web site which can give you it

Yes, well of course you can't tell. If they write it out themselves you can't tell where they've got the answer from. And obviously it's a problem we've got to tackle. I think different mechanisms of assessment would be the way around that one, you can't rely on course work perhaps, you need something else. Other forms, you know interviews or presentations or bilateral discussions – anything where they are forced to actually show you what they understand rather than simply give you something which is written when you have no way of attributing that work.

I can see it becoming a problem. How about the other side, people copying your work? If you put stuff on a web site and then you find other people are picking it up and using it?

Do you mean students or do you mean other staff?

I think other staff, really. Somehow we don't mind if students do because that's ..

Well, yes, so long as it's not going to be gaining credit for assessment but then that's up to you how you set your own work. Yea, as far as other staff are concerned, well I think everyone takes their own view about that, I mean my view is I really don't mind if people want to copy it, they're welcome to it, you know I don't feel any personal. I mean some people are very paranoid about work being taken "this is my work and I don't want anybody else to use it". I don't personally feel like that but if people do feel like that, it's up to them to decide, first of all whether to put them up to the web at all, some people choose not to. Other times you know you have to put some security on it, so that it's only available if they've got the right password, so I think there are steps you can take to secure that if you want to.

How about, you know, when you're researching material for your own course and you think "Have I got the right to take this?"

Yes, but I think that my, I might be legally wrong in this because I know the law changes all the time, but it's always been the case that the internet has been an open medium and that whatever you put there, if you put it there, then so long as you don't actually put a statement there saying "I own copyright of this, you must not use it" the

default position, if you like, is that it is available for you to use. And that's the way it's always been. But I think, you know, people would respect, if people did put something on there and said on it "I .." (whatever form of words they use to say 'do not copy this') then they'd respect that. You know, unless it says that, you assume it's OK to use it.

It's just that some people seem to be very concerned about it and some say "well, people should be able to use it, information is an open resource".

Yes, I think sometimes people might be thinking they might put the material together for a book, and then publish it. But then if you did that, then, again it's up to you, isn't it? You don't have to put the material available on the net if you don't want it to be available. So I think really people have got to manage that themselves.

Do you think so much use of the technology is causing you more work or less work?

Well it's a good question, when I think many people have said that technology is a good way of solving problems you never used to have! You know, various variations on that statement. I think that, you know, the tools now are so powerful, you'd expect them to be able to do so much more but I'm not sure that they do because, you know, people are more concerned with the look and feel and so forth, and anything else. I think now we take it for granted that all the documents we produce should be, you know, look perfect, you know, because we've got wonderful word processors that do it all for you. And so forth. I think the fact is that superficially they do make a difference but really I'm not sure that we can do that much more than we ever used to do. I think where it helps from the learning point of view is that, I think really the big thing is the interactive tools. In fact, if you ask yourself what can computers do that people can't, they can certainly do things that are infinitely repetitive, without anyone getting bored on the learning side, on the teaching side, if you see what I mean. So any tool where the computer can automatically generate some random test and the student can sit there and take it time after time until they feel they've learnt the idea, that's wonderful because, it's no effort on the part of the teacher except to set the thing up in the first place so long as it's used actively by the student. The students can use it as much as they need until they feel they've learnt that idea. There're all sorts of examples of where the thing really comes into its own because that's what it's best suited for. So anything like that where, you know, you can develop some interactive technology - I mean that's what we are interested in doing, that's what we do whenever we have a need for it, as I said before. But in other respects, you know, as you say, it does generate as many problems as it solves, I suspect.

I remember those dreadful handwritten cyclostyle-machine things

Yea, I know, the Banda machines, those things, yes. I did teaching practice, I did train to be a secondary school teacher but it was about 25 years ago, and these things were all in vogue at the time, yes.

Purple. It was always purple!

Yes. It was wasn't it? And it smelled nice. You always got a high from smelling it!

Do you think that it in any way, well you've talked about it constraining you, at least how a standard tool such as Blackboard can constrain how you can teach, what you can do. Do you think even, even the one you have made yourself constrains or otherwise changes your pedagogical style, for good or ill?

Well, I'm not sure that what we actually do probably does because we do still rely upon conventional techniques so, you know, you'll stand in front of a group and tell them how something works. It's not, you're not relying entirely upon the technology to do the delivery, we rely upon it to help support the delivery. I do think that, there are systems I've seen where you know perhaps an entire module is presented through a learning technology such as Blackboard or some other similar system. It's very

difficult for people to take the right approach because you've stood there watching students, how they use such a system, and they go click, click, click, click, and they don't sit and actually follow the material in the way the person who wrote it intended. You know, I do it myself, I know exactly how the students feel because whenever you are faced with a similar position, you are scrolling through the material as fast as you can go, you're not really taking it in, as soon as you see something to click you click it, and you're just moving through it at the wrong pace. I think it's very difficult to force the students to take it at the right pace. We've seen quite a few systems which, you know, people have spent a lot of time developing, and put a lot of resource into, and they are just not as effective as you had hoped they would be because of that reason. People don't read and take things at the right pace. To be honest, I'm not sure how you can get around that problem because I think it's human nature. So ..

It's like people starting to read at the end of a book.

Yes, I know, or flick through. It's the same thing. Flick through to get an idea of something. And then you might, again I've done this myself, you think you've understood something because you've looked at it superficially and you think "oh yes, I know what that's about" and you haven't followed it through properly and probably you've missed something important. And this is what happens.

It's not just the technology, it's human nature then?

Yes, absolutely, yes.

But perhaps it's more obvious ...

I mean sometimes, one or two of the tools I've seen, I can't think of the names of them now unfortunately but they actually have to do some activity and they don't get to see the next bit of the material until they've completed that activity, so it does force them to do things at the right pace and I think some element of that has to be incorporated in these systems in order to get it to work.

It's a bit bossy, though isn't it?

A bit what?

A bit bossy?

It **is** a bit bossy, I know, but it's only doing what a person sitting in front of a class would be doing, in that case. Well we, as I say, we do use it to support everything so our web pages, for example, would, as the classes went on through the course of the semester, you'd have more materials which were then available on that web page. So they could download things which have actually taken place but we wouldn't let them download things which have not yet taken place. I mean, you know, you'd have to stage those things appropriately.

Do you use e-conferencing on the VLE? You know, or threaded discussions?

By that you mean real time e-conferencing?

Yes

No we haven't. I must say, we haven't tried that. But what we have had are discussion forums. Of course they are not real time but people can use them to ask questions, to respond to questions, and they just don't seem to work. We had them there for several years and we pushed them and pushed them and the students just don't use them.

Is that the nature of your subject, mm?

I don't know really because the questions would be, if you like, subject independent, you know they might be "How do I gain access to such and such a thing?", "Where

can I find last year's exam papers?" or something. You know, these sorts of questions which might occur to them on any subject. And what the students invariably do is, they will e-mail the question to some member of staff, they don't use the conference, they go directly to a member of staff, and that happens all the time. So, I just don't know how you, if they don't find it useful, then probably it's not useful. I mean, I've heard some people say, because before Blackboard we had First Class conferencing, and I've heard people say how they would give people credit for using this, one element of the assessment. In fact I've been on an innovation panel for other courses where they've done this. They've said "well part of the assessment requires them to use conferencing, they will gain credit if they've used it". And they will get, it doesn't matter what they've said so long as their tutor can see they've used it, they get the credit. And you think "well, OK, is that, that may be the way they wanted to do it", I'm not sure it actually achieves much, you know. It assumes they'll naturally find it useful. It's this thing about signing up to it. If they can see a use for it, then they'll use it.

And if they can see another use which you didn't intend they'll find that as well! Which is good ... Um, you said that you keep a track of when they log on and things, do you tell them that you are doing that? Ask them whether it's all right?

Well, I suppose I should, shouldn't I? No.

I don't know. It's just that some people think that that's sort of surveillance,

Well I suppose so. But I mean it's not, it's not for any, well I suppose anyone could say that, couldn't they? But it's really not for any nefarious purpose. I keep a log of successful log-ins and unsuccessful log-ins. Because often they forget their password and if somebody has tried a few times unsuccessfully to log in I can see who's trying to log in and what they are doing wrong and I can e-mail them you know with the answer. As far as the log ins go it's just, basically it's just for interest. You know, to see who's logging in, and when, and where they're logging in from.

Yes, I can see where it could be very useful and I can see ..

Yes. The Data Protection Act, I'm not sure if it would cover things like that but I think we are aware of the potential problems by as you say, sort of keeping track of people without their knowledge.

The equivalent could be, I don't think they do, but the university could keep a track of when you log in to see whether you were being a "diligent teacher" and how would you feel about that? I don't know whether you wouldn't mind anyway ..

Well I certainly, I wouldn't mind but I can imagine some people might object. You know, we often find, we've got these swipe cards for when we come into these corridors, you know there's magnelocks on the doors, and it's often occurred to us, for all we know, people have recorded the times at which you used them, so they can see when you are coming in to work.

There has been some discussion in other places of assessment of teachers on how much they're using the web, they may be seen as more modern, more effective teachers, and many of these tools allow managers to supervise teachers' use of it.

I think the general answer to all those sorts of questions is, it's OK so long as you ask their permission. Of course, if I believe that's right, then I should have said this to the students! It's a good point that you've made and I should let them know.

I don't suppose they mind at all!

No, I don't suppose they mind because all I'm doing is recording the times and where from, but you are right, you are right.

But sometimes you can ..., you don't use it at the moment to see whether, if someone say has not logged in ever, whether they are perhaps struggling?

No, the area where we would do that is through these log books I mentioned to you before. They are reviewed weekly so if somebody's not doing it or is reporting problems then we would take action. But I mean it's a supportive action. We're not going to go heavy handedly penalising them or anything.

But there's always the student who does nothing all term and still can manage to pass! Especially in maths, actually. You know, some people can just do it.

Yes, some people can just do it. You have to be sure in our course but ..

I was one of those! Um, what about the feeling that, you know, 24/7 accessibility? That they can and will try to e-mail you any time and expect you to respond, even if it's 10 o'clock at night or on a Saturday, but ..

I don't mind them e-mailing me any time they like but I think that they can't realistically expect a response except during working hours. They often do get a response outside working hours but it's that, it's a question of expectation. If they say it's urgent, then, you know, I would normally respond, but I don't think they can really expect me to do that.

No, I don't think they can either, but you don't find that stressful?

No, no. I don't find it stressful. But other people potentially might of course. But then they don't have to look at e-mail. I think if anybody doesn't feel comfortable with that, then they just won't do it. I think the contract, the leaning contract wouldn't require them to look at these things outside normal hours, so it would have to wait until the next thing at work, you know. It hasn't proved to be a big problem, at least not so far.

Good. I think my next question has already been answered. It was, when people have a standard tool like your Blackboard, whether they were given any choice in which tool they used. And you have, in a way, as you've chosen not to use it!.

Yes, there was, when the VLE was chosen there was the opportunity to investigate other, similar systems. I can't really recall what they were now but I can remember coming to a meeting a few years ago where they showed you several systems but I think Blackboard was clearly the favoured one, by, er, whether it was computer services or I can't remember which group of people was clearly pushing it but basically it was clear that that was the favourite system. So, you know, particularly as I didn't have much of an axe to grind, I wasn't going to object to that.

How do you help .. I mean, you obviously know how to use it all yourself because you developed it but when you get new teachers in your area, new colleagues, do you give them courses or do you just sit beside them? Given that you are a small, tight group ...

Yes. Well, I mean as it's happened, and of course I can't say that this would happen if there was more of us, but as it's happened, every one of us has been highly literate. So they've come in, they've already been, particularly the younger staff, we've just in the last year or so had two new members of staff who are, I guess, probably around late 20s, and they had no trouble with it at all. They just went straight in, they've been familiar with similar systems elsewhere anyway so, there's no problem. For the other staff, I mean, we've definitely adopted a process of, they can take or leave as much of it as they like. Nobody's forced to use it and people can simply, I mentioned to you the FTP thing where they can just have a folder, they can just put materials there. If they put them there, students can see them. Some people just use that. And that works fine for them. So, they can just have as much or as little as they choose to.

So most people in your group are pretty relaxed about it all ...?

No, I think if we widen it a bit further to the School, so it's not just our group, but the rest of the School, I think there <u>are</u> people in the School, I mean I'm not being rude at all but I mean they clearly, er, don't like using technology at all and those people, I suspect they would be very reluctant to take up any of this at all, you know, they won't budge an inch, so I think that's an issue which they've got to deal with because I think the university is getting quite bullish about all this, you know about having to incorporate technological tools in some form or other. I think there has been, "encouraging" perhaps isn't quite a strong enough word, people aren't insisting on each module having a VLE site but there's certainly pressure being brought to bear.

And probably it will come

Yes, and whether or not they will force us to have one as well and say, "well alright if you want to link to somewhere else from it then OK" but I don't know quite what's going to come there but I know that there is a certain amount of pressure being brought to bear to incorporate that to a degree.

How do you feel about that?

Oh I think it's a bit silly really, but so long as we're not prevented from doing what we are trying to do, it doesn't make any major difference. If they say got to have a [corporate] VLE site, well look, I think it's a waste of time doing so but ...

But if they said you couldn't carry on using your thing, that you ought to use what facilities the VLE gave but not yours, then you would be irritated?

Yes. I think we'd fight it tooth and nail, to be honest! And, whether we succeeded of course would be another matter but I think we'd do everything we could to try and make the point that it would be educationally disadvantage, disadvantageous to our students, it would be a retrograde step for them. And hopefully somebody somewhere would actually recognise that this was true. But I don't think we'd take it lying down!

I think that the only way we can really argue the case is on pedagogic grounds. Because, if we say "We don't like your system" that's not going to get us anywhere.

How do you mean?

It's not going to get us anywhere because they'll say "Well I'm sorry but that's not your decision to make. OK, fair enough. Again, I'm not particularly happy with this corporate involvement, everything has to look corporate and everything, but I don't think that's an argument that we are ever going to win, so we just have to accept that. But I think as a member of staff here, as a member of the teaching staff, we should have some say in the way in which we deliver our materials. I think that is over which we can have say and hopefully we can win that particular argument. So far I don't think it's got to the point where we are in the threat of that, but you know, you do worry a little bit that it will come to that.

Um. We've covered all the themes that I've come across, so far, but do you have any other thoughts on, say feelings, ways you get round things, ways you deal with things, that we haven't covered?

Um. I'm trying to think now what sort of things that might be. Have you in mind any particular ones?

No, not at all. Anything I had in mind I've already covered.

I can't, nothing really comes to mind, I can't think of any particular other problems that we've had because, well the only problems really that have come to us are, more technical difficulties such as you know how you actually deliver the service, having your own hardware, managing that hardware, and if you like interfacing that to the

rest of the university's hardware infrastructure. So it's that side of things really and that is probably not of interest to you.

No. I was more thinking of things like if you feel that some of your colleagues might be at a disadvantage. Your group is fine because you can all use it but what if you are going to take on disabled staff, for example who're blind and couldn't use it, or, I don't know, people who just have a phobia about it? The other side of widening participation/equal access for students is equal access for staff and it could help or it could hinder. It was just a thought that occurred to me this morning, that there's the allowances for disability which we're always talking about for <u>students</u>, but we don't look at it from the point of view of how IT can help disabled staff.

Mmm. Well, there's just been a case in point, I can't remember where it came through. It came through from an e-mail or something recently. But it's now law isn't it that you have to provide equal access for people with disabilities. And that if your web site doesn't have simple tools to allow say, a blind person to find out what's on that site then in fact you are in breach of the law. So it's got quite serious. And I think we are all well aware of that. And of course it will apply to staff as well. And having a reliance upon technology makes you more open to that sort of a problem. so it's a difficult point to deal with because it's not always obvious to people exactly how you can create a web site which might be more accessible to a deaf person.

Or a blind person...

Yes, a blind person, particularly. But I think there are, there's quite a few help tools to tell you what it is you've got to do, but I think it's a learning experience for all of us, that. Though I think the difficulty with [disabled] members of staff who need to use it as well – I think with all of these we'd approach each problem and hopefully deal with it when it arose. I think sometimes you can spend too long anticipating problems ... I think where it's a legal requirement you have to do it, obviously, but other difficulties I think we have to cross those bridges as and when they arise.

Well, I think I've come to the end of my questions ... so we can turn this off, can't we?

Interview ended 11 45 am