The University Of Sheffield.

School of Education

A case study exploring the motivation and experience of members of the academy when they engage in work-based learning with employers

A thesis submitted in partial fulfilment of the requirements for the degree of Doctorate of Education

Researcher: Sandra Hilary Fisher

Supervisor: Dr. Simon Warren

Submission date: December 2011

Abstract

This research study explores the motivation and experience of a group of academics, based in the same large publicly funded higher education institute (HEI) in Ireland, who are actively engaging in Work-based Learning (WBL) curriculum development and delivery with employers and professional bodies aimed at meeting the learning needs of the workplace.

Using case study methodology, sixteen academics together with four functional leaders were interviewed. As participants understand the term 'industry' includes their Institute's engagement with public and private sector employers and professional bodies, where appropriate in this research study this term is used.

The research began before the onset of the recession in Ireland in 2008. For HEIs the last few years have been a period of change and uncertainty.

The research finds that the academics who participated in this study are motivated to engage in WBL curriculum development and delivery with industry for two reasons. Firstly, they perceive it as a mode of academic development which informs the development of institutional curricula and their practice generally. Secondly, these academics consider engagement in the activity as supporting the continuation of their School's tradition of service to industry, part-time students and alumni.

The findings also suggest that while challenges and tensions may arise during the development and delivery of WBL curricula with industry, within the participants' Institute the voluntary, reactive, fragmented and marginal basis of the activity inhibits the development of policies and practices which might alleviate these challenges and tensions. Senior management within the Institute recognise that national funding policies make it challenging for HEIs to develop activities such as WBL initiatives with industry.

The research concludes by proposing that in order to exploit the potential of HEIs' engagement in WBL with employers, national and institutional policies need to be developed which recognise, develop, and sustain it as a mainstream HEI activity.

Acknowledgements

I would like to express my sincere thanks to the participants in this research study. Participants were not only generous with their time but also in their willingness to share their experience of engaging in WBL with industry.

I would like to express my appreciation to my supervisor, Dr. Simon Warren, for his guidance and constructive criticism. I would also like to thank all of the staff at the University of Sheffield associated with the doctorate of education for their assistance.

Many, many thanks to Mary Henry-Kirwan, Roisin Connolly, and Deirbhile Nic Craith for many years of friendship and support. Special thanks also to Dr. Anne Murphy and Dr. Aidan Kenny for their generous advice and support.

Finally and most importantly, I wish to express my dearest gratitude to my family especially to Mum and my brother, John, and also dearly remembering Dad and my sister, Linda, for their constant encouragement and support.

Contents

		Page No.
Abstract		i
Acknowledgements		ii
Contents		iii-iv
Abbreviations		v
List of Tables/Figures		vi
	Part I	
Chapter 1	Introduction	2 - 7
Chapter 2	Contextual Review	8 - 32
Chapter 3	Literature Review	33 - 81
Chapter 4	Research Design	82 - 118
	Part II	
Chapter 5	WBL Leaders and Academic Practitioners - biography, motivation, and initiation of engagement with industry	120 - 150
Chapter 6	WBL Leaders' and Academic Practitioners' experience of WBL curriculum development and delivery with industry	151 - 196

Part III

Chapter 7 Discussion 198 - 230

Chapter 8 Conclusions 231 - 244

Bibliography 245 - 260

Appendices 261 - 271

Abbreviations

BERA	British Educational Research Association
CHERI	Centre for Higher Education Research & Information (Open University, UK)
ECF	Employment Control Framework
ESRI	Economic and Social Research Institute
EGFSN	Expert Group on Future Skills Needs
EU	European Union
Forfás	The Irish national policy advisory body for enterprise and science
HEI/s	Higher Education Institute/s
HEFCE	Higher Education Funding Council for England
IMF	International Monetary Fund
LMA	Labour Market Activation
NCC	National Competitiveness Council
NCPP	National Centre for Partnership and Performance
NFQ	National Framework of Qualifications
NQAI	National Qualifications Authority of Ireland
OECD	Organisation for Economic Co-Operation and Development
PMDS	Performance Management Development System
RAE	Research Assessment Exercise
REAP	Roadmap for Employment-Academic Partnerships
SIF	Strategic Innovation Fund
UTS	University of Technology Sydney
WBL	Work-based Learning

List of Tables/Figures

		Page No.
3.1	Development of the conceptual framework	75
4.1	Participants – WBL Leaders and Academic Practitioners	94
4.2	Participants – Functional Leaders	94
4.3	Stages of data analysis	104
5.1	Participants in the research study – Summary Table	121
5.2	WBL Leaders – biographical data	124
5.3	WBL Academic Practitioners – biographical data	125
5.4	The sources of industry clients	141
6.1	Types of industry engagement (indicative)	152

PART I

Chapter 1

Introduction

1.1 Preamble

Using case study methodology, this research study explores the motivation and experience of academics when they collaborate with employers on WBL curriculum development and delivery aimed at meeting the learning needs of the workplace. All of the participants who took part in this research study are based in the same HEI in Ireland which is one of the largest publicly funded HEIs in Ireland. Hereafter the HEI where the research study took place is referred to as the 'Institute'. Within the Institute the term 'industry' is used colloquially and in formal documents to encompass the Institute's engagement with private and public sector employers and professional bodies. In this research study, and as outlined in Chapter 4, Research Design, the term 'industry' is used and denotes participants' engagement with public and private sector employers and professional bodies. The term 'students/employees' is utilised to indicate, and to underscore, that within the confines of HEI's engagement with employers in a WBL initiative that students of the HEI are also employees located in the HEI's partner employer company.

There is no universally agreed definition of WBL. What is perceived and understood as WBL varies (Higher Education Academy, 2006). In the case of this research study Boud's definition of WBL closely coincides with the parameters of the research:

> WBL is the term being used to describe a class of university programmes that bring together universities and work organisations to create new learning opportunities in workplaces. Such programmes meet the needs of learners, contribute to the longer-term development of the organization and are formally accredited as university courses. (Boud et al, 2001, p.4).

Boud's definition highlights how WBL initiatives may be constructed around a tripartite relationship involving a HEI, an employer, and students/employees.

The remainder of this introductory Chapter outlines the origins of the research study and the structure of this thesis.

1.2 Origins of the research study

The origins of this research study are twofold. Firstly, I am an employee of the Institute where the research study was conducted. My initial remit was to promote and facilitate the development of relationships with 'enterprise' for the purpose of providing educational opportunities to employees of industry clients. During my eight years in this role, I experienced difficulties in meeting expectations around my role and also observed academic colleagues' frustrations while attempting to respond to requests from industry. Challenges which academic colleagues and I met include difficulties in accessing academic resources; questions around the academic merits of programmes; issues surrounding the Institute's responsibilities to students who are participating on a WBL programme initiated by their employer; and the services/supports the Institute affords to students on WBL programmes.

Secondly, I am interested in initiatives which facilitate access to higher education. My participation in higher education is due to receiving encouragement and support from my manager in the private sector at a very early stage in my career. As a result of this experience, I am interested in the role which employers may play in facilitating access to higher education. I believe an important resource to enhance access to higher education resides in collaborative initiatives between HEIs and industry. Potentially, collaborative initiatives between HEIs and industry may promote the efficient and effective deployment of stakeholder resources. For HEIs collaboration with external stakeholders is not unproblematic, however, by engaging in exploration, discussion and debate our understanding around areas of disagreement or concern may be uncovered and ways to enhance access to higher education be found.

1.3 The gap in knowledge

In Ireland many government reports have advocated that HEIs need to enhance their contribution to workforce development (Enterprise Strategy Group, 2004; Government of Ireland, 2011). It is difficult to understand why HEIs have not been able to commit to "sustained engagement in workforce development, when there have been long vocational traditions" within HEIs. The question has been posed as to why initiatives, such as WBL curriculum development with employers, continue to be marginal activities for HEIs. (Roodhouse, 2010a). For Portwood HEIs "have few problems with WBL until they contemplate its institutionalization" (Portwood, 2001, p.74). There are two issues around which there is agreement. Firstly, there is

public agreement on the part of stakeholders that HEIs in Ireland should support workforce development. Secondly, for whatever reasons, workforce development is a marginal activity for HEIs. Motivated and influenced by my experience and interest in WBL curriculum development with industry, and informed by undertaking a literature review for this research study, the objectives of the research study were refined and research questions developed. The objectives and the research questions in respect of the research study are outlined in the next section.

1.4 Research study objectives and research questions

1.4. 1 Objectives of the research study

The objectives of this research study are:

- To explore the experiences of academics actively engaging with industry on WBL curriculum development and delivery with a view to producing a piece of scholarly work which enhances knowledge in the field of WBL;

- Through the dissemination of this study to give 'voice' to the experiences of WBL academic practitioners with a view to sharing and enhancing understanding of practice;

- To make recommendations in respect of the development of policy and practice in the field of WBL;

- To identify any further areas for research.

1.4.2 The research questions

The following are the research questions:

1. What motivates academics in the Institute to engage in WBL curriculum development and delivery with industry and how is engagement with industry initiated?

2. When developing and delivering a WBL curriculum with industry what has been the experience of the Institute's academics?

3. Does the experience of the participants in this research study shed any light on the academy's engagement in WBL with employers, and if so, what specific matters are highlighted?

1.5 Real life research

According to Robson all research is 'real life' whether it is conducted in a laboratory, office, college or some other setting. The difference between conducting research in a laboratory and in a research site, such as the Institute where this research study was conducted, is that the laboratory functions as a closed system excluding external influences, while this research site is an open system (Robson, 2002). During the course of this research study significant changes took place in the external and internal environment in which the Institute operates, the Institute was restructured, and my role has changed.

1.6 The structure of the thesis

The following is the structure of this thesis:

Chapter 1, the Introduction, outlines the origins of the research study, the objectives of the research and the research questions.

Chapter 2, the Contextual Review examines the contextual forces shaping the role of higher education in Ireland with particular reference to the forces relevant to higher education's engagement in workforce development.

Chapter 3, the Literature Review explores issues raised in the literature around higher education's collaboration with employers on WBL curricula. Drawing on concepts raised in the literature this Chapter also outlines a conceptual framework for the research study.

Chapter 4, Research Design, outlines the issues which arose during the development of the research framework. It also discusses the challenges which I met as a novice researcher who is also an insider researcher.

Chapters 5 and 6 present the findings and analysis.

Chapter 7 discusses the findings and Chapter 8 outlines the conclusions.

Immediately following Chapter 8 is the Bibliography and Appendices.

Chapter 2

Contextual Review

2.1 Introduction

Before a report compiled by the Economic and Social Research Institute (ESRI) was launched in June 2008 predicting that Ireland was about to experience a recession for the first time since 1983 (ESRI, 2008), a contextual review for this research study had been drafted. This draft outlined the dominant influences shaping the role of higher education as the development of information and communication technologies; the marketisation in higher education and science (including a changed role of national governments); globalisation, internationalisation and regionalisation; an advancing network society (the rise of consortia, strategic alliances);an advancing knowledge society; socio-cultural trends; demographical trends (De Boer, Huisman, Klemperer, van der Meulen, Neave, Tens, and van der Wende, 2002). The initial draft of the contextual review had localised these influences to what was happening in the Irish higher education landscape.

I had expected it would only be necessary to undertake some minor updating and amending of this draft contextual review towards the end of the writing up of this research study. Instead I found myself revisiting the draft contextual review and reflecting on it in light of the onset of the recession and the changed economic circumstances prevailing in Ireland. Section 2.2 of this Chapter discusses the Irish higher education landscape prior to the onset of the recession. This is then reflected on in section 2.3. Section 2.4 then outlines some specific matters which have arisen since the recession, some of

which are still unfolding, which are of relevance to higher education in Ireland.

While this chapter concludes with a summary such is the reality of conducting real world research that the research problem exists in an open system and as such is subject to external forces (Robson, 2002). It is difficult at the time of writing to put a full stop and feel you have given a complete account of the context. As a novice researcher I learnt a salutary lesson as I moved through the research study and came to understand that it is not possible to give a complete or final account of the context, which is by its nature temporary, and this is part of the challenge of undertaking 'real world' research.

2.2 The Irish higher education landscape before the recession

2.2.1 The structure of the Irish Higher Education System

The history of the Institute where this research study was undertaken is rooted in the development of the provision of vocational education in Ireland. In Ireland in the 1960s a view was taken that the universities "were not sufficiently adaptable and their mission statements showed little emphasis on the application of knowledge and meeting the needs of the labour market". This view resulted in the establishment of a number of regional technical colleges in Ireland in the 1960s and 70s which would be "vocationally oriented". The establishment of the binary system in Ireland was motivated by a "desire to fashion the new sector in a manner which would best respond to meet the labour market needs of the economy ". (Clancy, 2007, p.113). These new regional technical colleges would provide education in areas such

as craft and professional training. Even during their establishment in the 1960s there was debate as to the appropriate level of education these regional colleges should provide (White, 2001). The 1990s saw the regional technical colleges migrating to the status of Institutes of Technology and the emergence of the Institute where this research was undertaken.

In order to bring coherence to the Irish higher educational award system in Ireland the government enacted the Qualifications (Education and Training) Act 1999 establishing the National Qualifications Authority of Ireland (NQAI). The NQAI developed a National Framework of Qualifications (NFQ) which has ten levels with level 6 (higher certificate) to level 10 (doctorate) being relevant to programmes provided by the institutes of technologies and the universities. I have worked in higher education since 1998 and in my experience while industry may not entirely understand the National Framework of Qualifications its development has raised awareness generally around the importance of the recognition of awards and 'certification'. 'Certification' is a word which I met frequently when I worked with industry in the field of WBL both within the Institute and with my former employer (a private not-for- profit HEI).

Within the HEI system the Institute is one of the largest HEIs in the state. The student body comprises of full-time and part-time students participating in programmes ranging from higher certificate to doctorate.

Since I joined the Institute in 2000, it has been restructured with a view to providing a more coherent organisational structure promoting opportunities for academic collaboration and sharing of resources. I have also witnessed developments such as the introduction of modularisation, the development of eLearning, the development of formal policies around the recognition of prior learning, an increase in the number of postgraduate students including the number of international students, and the growth of research Centres. Other developments include the introduction of a mandatory Post-graduate Certificate in Teaching and Learning for newly recruited academic staff.

In Ireland today there are 20 publicly funded HEIs of which 7 are universities with the remaining 13, including the Institute where this research was undertaken, designated as Institutes of Technology. There are also a few small teacher training institutions and some privately funded HEIs (OECD, 2004).

Since the establishment of the original regional technical colleges in the 1960s, there continues to be debate surrounding the role of the universities and the Institutes of Technology and the maintenance of a binary system of higher education in Ireland (White, 2001; OECD, 2004). Prior to the recession, and at the invitation of the Irish government, the Organisation for Economic Co-Operation and Development (OECD) conducted a review of the Irish Higher Education system. This OECD Report recommended the continuance of the binary system of higher education in Ireland and that for the foreseeable future no more HEIs should be granted university status (OECD, 2004). As will be discussed later in this Chapter, the advent of the

recession has re-ignited consideration of the structure of the Irish HEI system (Government of Ireland, 2011).

2.2.2 Human capital development and the knowledge economy

The Irish higher education system has been recognised as having made a significant contribution to the development of the economy with Ireland lauded for being:

> one of the first European countries to grasp the economic importance of education and economists suggest that the upskilling of the labour force accounts for almost 1% per annum of additional national output over the last decade or so. (OECD, 2004, p.3)

In 2004 the Irish government established the Enterprise Strategy Group to formulate a strategy to ensure the continued competitiveness of the economy. The Group comprised of representatives from industry and higher education. In its report, *Ahead of the Curve Ireland's Place in the Global Economy* (2004), knowledge creation was placed "at the core of economic activity":

> Knowledge creation and diffusion are at the core of economic activity. Knowledge is embodied in people, and it is the quality of the human resources that will determine the success or otherwise of firms and economies in the years ahead. It is people who create new knowledge, and it is people who disseminate, adapt and use data, insights, intuition, and experiences to create distinctive value. Although the pace differs from country to country, most countries are becoming more knowledge intensive. The challenge for Ireland lies in ensuring that we are at the forefront of this transition. While Ireland's education system has served the country well for many years, in the knowledge economy it faces increasing challenges. (Enterprise Strategy Group, 2004, p.26)

Ireland has embraced human capital theory which proposes that like other (physical) capital assets which through investment generate future income, investment in human development through education and training will result in enhanced productivity (Woodhall, 1997). Ireland's capacity to create and harness knowledge was considered central to economic development and having 'quality' human resources was considered vital in order to ensure success. While the past contribution of higher education to the development of the Irish economy was acknowledged, the report comments that if Ireland is to move to "higher value activities" the "education and training systems must adapt to produce the skills to drive successful enterprise" (Enterprise Strategy Group, 2004, p.73).

In its report the Enterprise Strategy Group recommends Ireland's higher education system should be responsive to the needs of the economy, be competitive in the sense of institutions competing against each other for funding, and produce graduates of the highest quality. The "quality of (Irish) awards should be benchmarked internationally". (Enterprise Strategy Group, 2004, p.75). The Group's report identifies the essential role of lifelong

learning in upskilling the workforce and recommends the introduction of a national 'one step up' initiative aimed particularly at those in the workforce who have low level qualifications and are in low paid employment. The Group proposes employers have a greater role in the governing bodies of HEIs and related higher educational bodies. The Enterprise Strategy Group's report acknowledges that higher education does not just have an economic role but also has social and cultural roles, but their review was addressing economic issues only.

As referred to earlier, in 2004 the OECD, at the request of the Irish government, conducted a review of the Irish higher educational system. The final report from the OECD examiners notes that among the objectives specified for the Irish higher education system, which were outlined in a background report given to the OECD team of examiners, was the "promotion of the responsiveness of higher education to the needs of society and the economy" and "engagement with the 'Lisbon' objectives in the promotion of the role of the universities in the Europe of Knowledge". Other objectives outlined in the background report provided to the OECD examiners related to access, standards, promotion of research, lifelong learning, utilisation of information and communications technology, improvements in governance and accountability, and responsiveness to regional issues. (OECD, 2004, p.7).

Higher education is subject to fashion trends with concepts, such as the knowledge economy, gaining currency. Examining how these concepts

evolve is important (Tight, 2002). The conversion of concepts into theory, policy and practice is undertaken by different stakeholders, and is therefore likely to be subject to different value interpretations, resulting in differences in emphasis, priority and resources being applied or not to the translation of a concept into policy and practice. Complex concepts such as the 'knowledge economy' or 'knowledge society' are now used very loosely and are part of everyday language. The term 'knowledge economy' was popularised by Peter Drucker in the 1960s when Drucker identified a shift in importance to society from the production of goods to knowledge production. The growth of human capital theory and the massification of higher education, which began in the U.S. in the 1950s spreading to Europe in the 1960s and 1970s, has resulted in the rise of 'knowledge' as a force in the economy and society. One explanation for the phenomenal growth of the U.S. economy in the 1990s was attributed to the fact that over 50% of the population had gone to college (Sorlin and Vessuir, 2007).

Concepts such as the 'knowledge economy' and 'knowledge society' are complex. It is suggested that "there is no clear cut definition of knowledge society, other than the untold assumption that 'knowledge' should be dominant just as agriculture and industry have dominated earlier societies". As has been wryly commented, "knowledge is almost universally considered to be a public good" . Some argue that advocates of the knowledge economy believe the knowledge economy "is principally factual" whilst advocates of the knowledge society construct the knowledge society as "an ideal" . (Sorlin and Vessuri, 2007, pp.1-12). What is unclear in the knowledge society or

knowledge economy is who decides and controls the type of knowledge produced and how interpretations of the knowledge economy or society shape government policies, such as higher education policy, and hence impact on wider society.

2.2.3 Accounting for institutional performance

Prior to the announcement in 2008 that the Irish economy was in recession, a number of Irish government reports had raised issues around the funding and performance of HEIs. In Ireland the higher education system is predominantly funded by the state with the university sector and the institute of technology sector receiving approximately 85% and 90% of funding respectively from the state (OECD, 2004). There have been calls for higher education in Ireland to generate alternate sources of income and be less reliant on state funding (Skilbeck, 2001 and OECD, 2004). The OECD Examiners' Report (2004) on the Irish higher education system suggests the Irish government consider the re-introduction of fees for undergraduates, with the proviso that students who could not afford fees be supported and that the income generated from these fees should not result in any reduction in state funding. This approach would result in institutions having an additional source of income. While the suggestion of the re-introduction of fees has not been implemented, since the advent of the recession student fees and the funding of higher education generally are very much back on the government's agenda (Government of Ireland, 2011).

Aside from pressure to generate alternate and additional sources of income prior to the recession, higher education was also facing increasing scrutiny as to how efficiently and effectively it deployed the financial resources granted to it by the state. Similar to the experience of the Australian higher educational system Ireland had begun to introduce requirements on the part of HEIs to prepare institutional profiles using a standard format which it is argued results in the standardising of institutional planning, accountability and funding (Marginson, 1997). The OECD Examiners Report recommends Irish "institutions be funded through a contract against an agreed strategic plan which will significantly increase accountability for performance" (OECD, 2004, p.25). This report also makes recommendations for the delivery of more timely audited accounts.

As well as requirements for HEIs to be more accountable in respect of how they deploy resources prior to the onset of the recession in Ireland in 2008, HEIs were also competing against each other for state funding. For example, under the Irish Government's Strategic Innovation Fund (SIF) for higher education launched in 2006, which had a budget of €300m to be allocated over five years, institutions competed for funding. The application of performance indicators and comparative statistics to the activities of HEIs has not met with uniform agreement and "there are widely divergent views on the increasing involvement of the state and its agencies in evaluating higher education processes, structures and outcomes" (Skilbeck, 2001, p.101). It has been argued that higher education has tended to overlook that other sectors, for example business, are confronting similar forces of change and are trying

to respond to them. Higher education also ignores the "continuance of powerful academic structures and processes" (Skilbeck, 2001, p.114). Public service workers may use different language, for example, adopting the language of the economy and markets depending on the audience being addressed while retaining their own values regarding the service they provide (Deem, 2001).

Recognition on the part of government that research is a significant contributor to economic growth, combined with increasing public awareness of the position of HEIs on global ranking tables, is resulting in government intervening to strategically develop the research capacity of HEIs. HEIs are becoming increasingly sensitive to activities which will enhance their global rankings. HEIs , especially those which are relatively new to research and are trying to build their research capacity, operate in an increasingly competitive HEI market with institutions compared not just against each other nationally but on an international basis (Hazelkorn, 2005 and 2009). HEIs confront many priorities and pressures in respect of expectations around their contribution to economic development, competitive pressures for funding, and pressure to enhance their position on global ranking scales.

2.2.4 Measuring individual performance

In Ireland, under the heading 'Modernisation of the Education Sector', the 2003-5 Social Partnership Agreement, *Sustaining Progress,* as negotiated by the Irish government with the trade unions, provided for the extension of the government's Performance Management and Development System (PMDS)

to staff in Ireland's institutes of technology. PMDS allows for the setting of individual employee goals, an annual review of performance, and identification of employee development needs. The same agreement also outlines what was agreed in respect of institutional planning and performance management for Irish universities (Government of Ireland, 2003). The Social Partnership Agreement Towards *2016 Ten-Year Social Partnership Agreement 2006*-2016 (Department of An Taoiseach, 2006) contains a provision for a review of PMDS. It also agreed that academic contracts would be reviewed with a view to looking at the complete range of services to be provided by academic staff (Department of An Taoiseach, 2006). Stakeholders in higher education may view the application of management practice, 'new managerialism', from the private sector to public services, such as higher education, as simply seeking greater productivity in return for pay increases and more tangible evidence of 'value for money'.

2.2.5 Marketising of a public service function and/or responding to the needs of learners

Prior to the recession HEIs service delivery to the workplace had been challenged. For example, a report produced by the Forum on the Workplace of the Future, which was established by the government and operates under the auspices of the National Centre for Partnership and Performance (NCPP), includes the suggestion that there is a need for a 'new' relationship between HEIs and the workplace which promotes access to higher education, gives recognition to the learning that takes place in the workplace, and is supported by mechanisms which promote "flexible and targeted delivery by the

universities and Institutes of Technology of continuous learning programmes" (NCPP Forum on the Workplace of the Future, 2004, p.83).

Some argue that the university's traditional service function, for example, providing continuing professional development programmes for adults, is being replaced by a concern to generate additional income resulting in the university's service function being reconceptualised as a commercial activity rather than a public service (Einsiedel, 1998). What is different today is the heightened degree to which these:

> continuing professional development programs are expected to generate surplus revenue for the university. There is also far more competition from an increasing number of providers of similar educational services. (Einsiedel, 1998, p.19).

It has been argued that the "commercialising of education also legitimates new forms of commodified knowledge, as the curriculum is adapted to meet client demands" (McIntyre and Solomon, 2000, p.90). Others argue it is not the generation of income which is the problem with commercial educational initiatives with employers rather that they are not undertaken to promote a substantial academic function (Bok, 2003). While others express concern that when recruiting academic staff to participate in a WBL initiative, academic staff have asked "what's in it for me" (Gustavs and Clegg, 2005) and the "economic model of education" results in viewing learners as "objects of educational achievement to be counted, accredited and initiated into the performativity of a credentialised society" (Gibbs, 2001, p.86). The introduction of debates around the funding of higher education and income generation for academics and their institutions raises concerns as to whether

the quality of the curriculum is compromised, and as a result, the students on such programmes are disadvantaged.

A belief that a market is not serving the consumer may result in government intervention, and in order to address this, government may decide to adjust or regulate a particular market (Jongbloed, 2003). The developments and suggestions around the financing of higher education, referred to above, were interventions and signals on the part of the Irish government to encourage institutions to become more effective and accountable. Prior to the recession the government apron strings were being loosened and tightened, with HEIs encouraged to become self-financing and to generate discretionary income, while at the same time becoming subject to greater scrutiny and comparison around their performance.

2.2.6 The influence of globalisation and internationalisation

Castells defines the global economy as:

> an economy whose core components have the institutional, organisational and technological capacity to work as a unit in real time, or in chosen time, on a planetary scale. (Castells, 2000, p.102)

Globalisation is not confined to the provision of goods and services. It also extends to social and cultural practices which are often directed by multi-national companies and the spread of information and communications technology especially through the internet (Deem, 2001).

Internationalisation relates to "the sharing of ideas, knowledge and ways of doing things in similar ways across different countries" (Deem, 2001, p.7).

Not only is the state no longer the "sole guardian of knowledge production" but it is no longer possible to restrict its production within nation states (Delanty, 2001,p.4). Globalisation creates a 'world system', for example for products and services which supersedes national borders, whereas internationalisation retains the power of the nation state and is articulated via "bi-lateral or multi-lateral relations between individual nations" (Marginson, 1999, p.19).

Globalisation and internationalisation provide opportunities, threats and challenges for higher education and impact on higher education in a number of ways which are outlined in the following paragraphs.

In order to compete in a global and knowledge based economy the Irish government wishes to increase the number of those entering higher education and promote the ongoing development of those already in the workforce. The desire for knowledge-based economies brings about a desire for technical and adaptive skills to respond to rapidly changing markets and also generic skills such as the ability to manage and analyse information (McNair, 2001). Globalisation has resulted in changes in employment patterns with a reduction in the number of those employed in traditional industries, such as agriculture, and an increase in the number employed in manufacturing and services. Countries wishing to remain competitive want to move into high value knowledge-intensive industries (Green, 1999). Investing in the development of those already in the workplace is seen as key to creating a knowledge economy and thereby competing in a globalised economy. Meeting the

needs and expectations of all stakeholders in higher education raises the question as to whether HEIs confront challenges in attempting to do so.

Global companies have the resources to develop their own 'universities' with companies, such as, McDonalds, Disney, and Motorola creating 'universities' (Jarvis, 1999). Not only are these companies potential competitors for HEIs in respect of students but they may direct the conceptualisation, development and delivery of knowledge as it relates to the workforce. It is interesting to note that companies use the term 'university' to describe their learning development facilities which may be a way of conferring 'university' legitimacy or prestige on these facilities. It may also be that there is an unarticulated belief that, not only does college knowledge have currency, but it is in some way superior. While within HEIs there may be concerns about a potential 'take over' by companies in the teaching of students, what may be overlooked perhaps is that higher education and the notion of the 'university' continues to have appeal.

Globalisation not only breaks down national borders in respect of the exchange of goods and services but also promotes, particularly through the use of information and communication technology, the exchange of social and cultural practices. Academics now have access, particularly via the internet, to vast amounts of information. Many academic journals are now available online as well as conference papers produced by academics worldwide. EU sponsored programmes facilitate academic exchange programmes as well as student placement programmes abroad. Air travel has become cheaper and

more accessible facilitating, academics attending conferences abroad. All of this I think presents opportunities and challenges for the academic community to remain abreast of developments in their field on an international scale.

2.3 Reflections on changes in the Irish higher education landscape

I believed that when it came to finishing the writing up of the research study, I would be making some minor amendments to the contextual review. Instead I found myself rereading the early draft and reflecting on the real life experience of a sentence I had written in this draft, that is, "HEIs are part of society and as such are subject to the infiltration of ideas and developments arising outside of the academy". Robson's words that, in undertaking case study research the researcher is conducting research in 'real life' situations, certainly resonated with me (Robson, 2002) as did Berliner's words that educational research is the hardest science of all (Berliner, 2002). It was not possible to place the Institute where the participants in this research study are located in a test tube for the duration of this research study and 'control' it for the purpose of the research. When the original contextual review was written the external forces influencing higher education seemed less urgent and immediate. However, when data collection began in 2009 the effects of the recession were already being felt, and since the data collection was completed more pressures on higher education have emerged. The Institute where participants are based is one of the largest HEIs in Ireland. Prior to the recession it and other institutes of technology in Ireland had expressed interest in obtaining university status. There is a greater sense of uncertainty around the future shape of the HEI system in Ireland. This uncertainty co-exists

with financial pressures on Irish HEIs. The next section discusses some of the dramatic developments which have taken in Ireland since 2008 and their impact on higher education.

2.4 The impact of the recession

As outlined in the introduction to this chapter, a report of the ESRI (2008) indicated Ireland was about to experience a recession for the first time since 1983 due to an "international credit crunch, a recession in our trading partners, rising energy costs, adverse exchange rate movements and the severe correction in housing construction" (Government of Ireland, 2008, p.26).

In order to address the decline in the Irish economy, the government launched a number of initiatives. For example, the concept of building a 'Smart Economy' was developed built on a two-pronged approach of strengthening the enterprise economy and building an ideas economy to create 'The Innovation Island' (Government of Ireland, 2008). To put it simply the government wants to make the Irish economy more competitive and attractive to industry.

From the outset of the recession it was recognised that controlling public finances would need to be prioritised. The government commissioned the economist and academic, Colm McCarthy, to examine public service numbers and expenditure. In 2009 the two volume *Report of the Special Group on Public Service Numbers and Expenditure Programmes* (Government of

Ireland, 2009a and 2009b), colloquially known as 'the McCarthy Report', was published. In respect of higher education the Report identifies areas with the potential to generate savings of €271.2m with an associated reduction in staff numbers of 2,000 (there is 20,873 staff employed in higher education). In the institute of technology and university sectors the academic employment contract was considered problematic. In the case of the institute of technology sector the Report recommends academics be given an annualised contract in place of the current contract which specifies a teaching commitment of 560 hours for lecturers and 630 hours assistant lecturers over an academic year with a weekly norm of 16 and18 hours for lecturers and assistant lecturers respectively. The Report also comments that there "is no requirement to be on campus other than for delivering lectures and there is no system of accountability for the performance of non-lecturing duties". The Report recommends the re-introduction of third level fees for full-time undergraduate education which had been abolished. It also proposes that a number of institutes of technology be amalgamated. (Report of the Special Group on Public Service Numbers and Expenditure Programmes, 2009b, pp.63-71).

During 2009 Government agencies such as the National Competitiveness Council (NCC) and Forfás, which examine and report on matters related to competitiveness and economic development, stressed both the importance of the higher education system to enterprise development and also, in the face of a severe decline in public finances, that HEIs perform effectively and efficiently (Forfás, 2009; NCC, 2009).

In 2009, the government established a Higher Education Strategy Group to develop a strategy for the development of higher education in the context of supporting the objectives for the development of a Smart Economy. In August 2010, the Higher Education Strategy Group produced a draft report, *The National Strategy for Higher Education'* which was formally launched in January 2011 as *The National Strategy for Higher Education to 2030.* However prior to its launch, and after several months of uncertainty, in November 2010 the Irish government sought the assistance of the European Union (EU), culminating in the announcement that Ireland was to get a €85 billion 'bailout' from a joint EU and International Monetary Fund Programme (IMF) for Ireland at an interest rate of 5.8%. This EU/IMF rescue package was conditional on fiscal and banking reforms and reducing Ireland's budget deficit over the next few years (Labanyi, 2010). In late 2010, the then Fianna Fáil led government launched *The National Recovery Plan 2011-2014* which proposes many initiatives aimed at reducing public expenditure. In summary the period of 2008-early 2011 was a period of wage decline for both the private and public sector with unemployment rising to 14.7% (O'Brien, 2011). It was also a period of critical examination of the role of higher education both as a cost to the exchequer and as a contributor to economic development with implications for the structure of higher education, students and staff.

2.4.1 Higher education as a cost

Higher educational fees for full-time undergraduate education were abolished in 1996-97 (Higher Education Authority, 2009). The latest Report

(Government of Ireland, 2011) on the Irish higher education system recommends "the funding base for higher education must be broadened through the reform of student financing, including a new form of direct student contribution based on an upfront fee with a deferred payment facility". The Report recommends greater institutional autonomy and responsibility for performance as well as reducing the reliance on state funding over the lifetime of the report. (Government of Ireland, 2011, pp.120-121). While full time undergraduate students do not pay fees HEIs charge a student services fee which has risen from €670 in 2003-04 to €900 in 2008-2009 (Higher Education Authority, 2009). Reports (Higher Education Authority, 2009; Government of Ireland, 2011) recognise the current free fees system for undergraduate higher education is inequitable from the perspective of part-time students and there are recommendations to provide for more equitable fee arrangements between full-time and part-time students. It is difficult at this time to see whether abolishing free fees for full-time students or some sort of overall restructuring of higher educational fees will equalise opportunities for access, unless there is also an assessment of the capacity of the higher education system to deliver and support programmes in a way which takes into account the needs of workers, their employers, and families. The concept of higher education being a public good from which individuals accrue individual benefit has been explored (Fisher, 2006) and current debate in Ireland (Government of Ireland, 2011) posits this as a reason why individuals should pay fees. However, whether by paying fees this will impact on students' attitudes when they enter the workplace as employees, some of whom will be future managers and decision-makers in respect of

employee development, is unknown. The current adverse economic situation in Ireland makes it difficult to debate issues around the individualising of responsibility for financing one's higher education and how this might reshape workplace policies around responsibility for employee development.

In 2009 a moratorium on the recruitment of staff to the public sector was introduced, and under the auspices of the Higher Education Authority, recruitment of staff to higher education operates under an Employment Control Framework (ECF). This ECF only allows HEIs to fill appointments if they achieve an overall reduction in staff numbers as specified by the Higher Education Authority. Since the introduction of the ECF staffing in the higher education sector has been reduced by 1,361 representing a 7% reduction resulting in savings to the exchequer of €80m while student numbers have increased by 15% (Boland, June 2011). Simultaneously staffs across the public sector, including higher education, have experienced salary reductions. Under the terms of an agreement between the government and the Teachers Union of Ireland (TUI) academic staff in the institutes of technology must be available during the academic year for up to two additional hours to undertake educational activities at the discretion of management (Teachers' Union of Ireland, 2011).

More recently *The National Strategy for Higher Education to 2030* (Government of Ireland, 2011) includes a provision for consolidation of some of the existing Institutes of Technology and the establishment of a Technological University with "rationalization and efficiency" being identified as objectives, not simply outcomes of system restructuring"

(Hazelkorn, 2011, p.13). This Report includes recommendations around the need for greater institutional co-operation and collaboration. While dismissing the need for additional universities the Report recommends "there is a case for facilitating the evolution of some of the existing institutes (of technology) following a process of consolidation, into a form of university that is different in mission from the existing Irish universities" (Government of Ireland, 2011, pp. 101-106). In June 2011, the Higher Education Authority circulated criteria for designation to Technological University Status inviting the higher education sector to comment on these criteria (Higher Education Authority, 2011). While the future structure of the higher educational landscape is currently unknown what seems certain is it is about to change.

2.4.2 The imperative on higher education to contribute to economic development

Central to the development of the Smart Economy is recognition that there is interdependence between four forms of capital, that is, human or knowledge, physical, natural or environmental, and social capital (Government of Ireland, 2008). Not only have various reports emphasised the importance of upskilling the unemployed and the employed, but these reports have also emphasised that the higher education system must be responsive to the needs of the economy (Forfás, 2009; 2010; 2011). Due to the recession there is a sense of urgency that HEIs need to react swiftly to the new economic environment, and as discussed earlier, the system is restructured to do so.

HEIs, including the Institute where this research study was conducted, have been involved in initiatives such as the government-driven Labour Market

Activation (LMA) programme which has involved HEIs tendering for the provision of higher level programmes for the unemployed. Initially these programmes were full-time programmes but the latest LMA programme includes provision for part-time programmes with a view to ensuring those who are unemployed will be in a position to continue their studies in the event of their taking up employment. Under the LMA Programmes institutions are invited to tender for the provision of programmes in specific disciplines which are allied to the anticipated needs of the economy. In essence government policy is based on 'alignment' with the imprimatur that "upskilling and reskilling education and training programmes must based on employer and employee identified training needs and be aligned with national labour market policy objectives, with a focus on outcomes" (Forfás Expert Group on Future Skills Needs (EGFSN), 2011, p.2).

2.5 Summary

Prior to the onset of the recession in 2008 there were indications the Irish higher education system was to be reformed. In particular there were suggestions in various government reviews, for example the OECD Review of 2004, that higher education must become less reliant on state funding and more accountable for performance.

With the advent of the recession the need for change has taken on a greater sense of urgency and this can be seen in the relatively short length of time it has taken to produce The *National Strategy for Higher Education to 2030* (a draft of the report had been circulated in August 2010) and the development

of a draft of the criteria which will inform the establishment of a Technological University (Higher Education Authority, 2011). The establishment of new Technological University/Universities is likely to involve rationalisation among some of the institutes of technology. Focussed, flexible and increasing provision is the order of the day for HEIs with fewer staff and increasing accountability requirements for individual employees and their institutions.

The new environment with its focus on meeting the needs of industry and collaboration may enhance opportunities for academics interested in engaging with industry. The challenge may be whether increasing demands and reducing resources will support this engagement.. The new environment is already, for example, through the LMA Programme referred to earlier, giving preferential treatment to the provision of programmes required by the economy. It is too soon to assess whether the recession and issues around the financing of higher education will change, not just the choices made around which higher educational programmes are supported, but what impact the recession may have on the beliefs of stakeholders in society around learning in the workplace.

Chapter 3

Literature Review

3.1 Introduction

This chapter first discusses the evolving role of higher education and the influence which external knowledge producers have on its role. It then examines issues and challenges raised in the literature surrounding the impact which WBL employer partnerships may have on the traditional academic functions of curriculum development and delivery.

Drawing on matters raised in both the Contextual and Literature Reviews, the chapter concludes by outlining a conceptual framework for the research study.

3.2 The evolving role of publicly funded HEIs in society

What role should higher education fulfil in society has, and continues to be, a much debated topic. Whether the role of higher education is "service to the public" or "more contemplative scholarship" has always been the subject of dissension and debate (Rosovsky, 2002, p.14). The traditional view of the role of the university has been described as:

> First, as a producer of knowledge, whether in the form of scientific results (and other knowledge products) or of scientifically trained people; second, as a producer of 'knowledgeability', in the shape of both a more highly educated, and presumably more scientifically rational and literate, population and, more generally enlightened society and sophisticated culture. The first role reflects its scientific responsibilities; the second its social responsibilities. (Scott, 2000, p. 192)

This traditional view of the university's role represents it as serving science by supplying new researchers and knowledge, and serving society by supplying an educated populace. Scott (2000) questions whether higher education was ever the dominant knowledge producer and also alludes to historical tensions which existed within HEIs whether it should prioritise the needs of learners or researchers.

Prior to the massification of higher education in Ireland which, as in many western countries, began in the 1960s it has been argued higher education had a gentleman's agreement with government and in return for its autonomy "it would furnish the state with its cognitive requirements" (Delanty, 2001, p2). This agreement was based on the premise that higher education was the best judge of its role in society. The framework for the activity of the university was a search for knowledge and truth delivered to society "value free and yet not value-less" (Barnett, 2000, p.25). The argument promoting the university's autonomy was that by having autonomy the university was enabled to pursue its search for knowledge unfettered by vested interest or performative concerns. From the public's perception this may have helped to perpetuate a mystery as to what transpired within institutions and promoted the notion of higher education as the 'ivory tower' separated from society and its influences.

After the second world war many western countries invested in both second and higher level education. The massification of higher education led to a significant growth in the number of people participating in higher education.

Attending higher education moved from being a privilege to a right (Trow, 1974). The massification of higher education not only resulted in changing the demographic profile of students but was also accompanied by a number of other changes which impacted on higher education. For example, higher education was required to facilitate the needs of different types of learners including mature students and new groups of professionals and there was a growth in new technology which could be used in teaching. Also, there were tensions over whether to prioritise research or teaching, and the nature of research was changing with less emphasis on primary research and more on applied research. In addition there were expectations that higher education be more accountable and seek out new sources of funding (Gibbons, Limoges, Nowotny, Schwartzman, Scott, and Trow, 1994). For higher education making decisions on the terms of its engagement with society is one which involves it (higher education) experiencing:

> ongoing intense scrutiny of higher education, both through external inspection and internal introspection. Universities have to negotiate their way across myriad, often contradictory, demands – to change radically in many respects and remain stable and consistent in others, to account to many stakeholders with hugely different needs and yet retain a recognizable measure of autonomy and independence, to become more individually competitive at national, regional, and international levels while operating in partnership and cooperative mode with other institutions, to compete successfully with vast commercial organisations that are becoming education vendors on an increasingly global scale . . . . (Singh, 2007, p.55)

3.2.1 The emergence of new knowledge producers

The massification of higher education was accompanied by the emergence of new rival knowledge producers based outside of higher education. Higher education was now producing a large number of potentially rival knowledge

producers capable of not only competing with higher education but also on judging the quality of knowledge produced by it (Gibbons et al, 1994).

The activities of these new knowledge producers stimulated the emergence of Mode 2 knowledge production. Prior to the emergence of Mode 2 knowledge production, the type of knowledge produced was defined by, and developed within, the confines of academic disciplines and has been designated as Mode 1 knowledge production. (Gibbons et al, 1994). The emergence of Mode 2 knowledge production resulted in several significant changes taking place in the production of knowledge.

Firstly, not only are there knowledge producers outside of the academy involved in knowledge production but knowledge production has become a transdisciplinary activity. Secondly, Mode 2 knowledge production is focussed on application and a desire to prioritise early and practical use. Thirdly, Mode 2 knowledge producers are required to be accountable to a larger number of stakeholders including government and wider society. Fourthly, within Mode 2 the parameters of quality control for knowledge production have expanded with an expectation that these will be taken into account and may be the subject of debate by society in general. (Gibbons et al, 1994).

According to some researchers, Mode 2 knowledge production has now shifted to another stage of evolution and we are now witnessing the transformation or extension of Mode 2 to Mode 3 knowledge production. It

has been argued that Mode 3 knowledge production involves the academy pursuing knowledge production motivated by its own economic interest which it pursues "in concert with particular corporate interest outside of the academy (Rhoades and Slaughter, 2006, p.17). Rhoades and Slaughter describe how previously within Mode 1 knowledge production accountability was internal to the discipline. The advent of Mode 2 knowledge production has resulted in what they describe as the inclusion of 'social' accountability, that is, it expands knowledge production to include considering the needs of and impact of knowledge production on other stakeholders in society. In contrast Mode 3 defines knowledge production as rooted in and undertaken for the economic interests of the university which are then pursued jointly with corporations. While Mode 2 knowledge production mainly impacts upon research, Mode 3 knowledge production impacts on higher education's teaching function and its relationship with students. (Rhoades and Slaughter, 2006).

My interpretation of the work of Rhoades and Slaughter is that Mode 3 knowledge production brings the needs of a selected group of stakeholders into the academy. Mode 3 knowledge production suggests that there is a price for and limit on the academy's engagement in knowledge production based on its economic interests which may result in it preferentially engaging with stakeholders who can help the academy pursue its economic interests. What is also interesting to me about the work of Rhoades and Slaughter is that it suggests that Mode 3 knowledge production is more about who can further the economic interest of the parties involved, rather than the type of

knowledge produced, how it is produced and its impact. I think the work of Rhoades and Slaughter illuminates the complexity of knowledge production and serves to inform debate within publicly funded HEIs which are, as outlined in Chapter 2, the Contextual Review, under pressure to source alternative sources of finances and to serve the needs of the knowledge economy.

Mode 3 knowledge production is facilitated by the emergence of new professionals (Rhoades and Slaughter, 2006). These professionals are employed to further the commercial activities of HEIs and to develop relationships serving the economic interests of their institutions. Interestingly research undertaken by Whitchurch (2008) outlines the emergence of 'third space' professionals within HEIs. According to Whitchurch the identity of professionals within HEIs is blurred as some of these professionals have mixed roles with elements of professional and academic activities. In addition some professionals within HEI work on cross-institutional projects or activities some of which may involve external engagement. My initial role in the Institute where this research study was undertaken involved external engagement and was also cross institutional. The work of Rhoades and Slaughter (2006) and Whitchurch (2008) resonates with me as it highlights the complex issues around the identity and roles and responsibilities of stakeholders within, and external to, the academy when we engage in WBL programme development and delivery.

3.2.2 The impact of external knowledge producers on the academic community

Research undertaken by Henkel (2000) indicates the academic community is responding to emerging demands, such as preparing students for the labour market, with participants in the research agreeing that the academic community has to accept some responsibility for workforce development. However, the role of higher education preparing students for the labour market is still controversial (Henkel, 2000). It is not clear whether academics may have different views on their role in teaching undergraduates whose careers have yet to commence as against their role in contributing to the development of those already in employment. It has been observed:

> New language had, in many cases, not diminished commitment to academic values and pre-existing concepts of higher education, but it was not always clear how individuals were managing their co-existence. (Henkel, 2000, p.223)

Research undertaken among academics in Scotland and England (Paterson 2003) concludes that:

> the widespread prevalence, throughout England and Scotland, of the core elements of the democratic intellect: that universities should serve society, both in their teaching and in their research; that knowledge is potentially socially useful, including of use to the economy; that governments have the right to hold universities to account; and that it is proper for academics to feel loyalty to society as well as to their discipline or institution. These views are held alongside a persistently high level of attachment to the core elements of traditional academic values, such as advancing basic research and maintaining liberal culture.(Paterson, 2003, p.90)

The research found academics in Scotland tended to emphasize a more civic role for higher education than academics from England. However academics who received their initial education in England and subsequently joined Scottish universities held beliefs around the role of higher education that more closely resembled those of their Scottish colleagues. It is unknown as to

whether these 'in-comers' already held similar views to their Scottish colleagues, and hence were attracted to join an institution which more closely matched their values, or whether due to interacting with new colleagues their beliefs and values shifted (Paterson, 2003).

Some argue that higher education's relationship with the workplace is fraught with danger in that it will inhibit academic freedom resulting in higher education compromising its willingness to challenge employers (Rhoades and Slaughter, 2006). In Ireland academic freedom is enshrined in legislation. Section 7 of the Institutes of Technology Act 2006 specifies:

> A college, in performing its functions shall have the right and responsibility to preserve the traditional principles of academic freedom in the conduct of its internal and external affairs.
>
> A member of the academic staff of a college shall have the freedom, within the law, in his or her teaching, research and any other activities either in or outside the college, to question and test received wisdom, to put forward new ideas and to state controversial or unpopular opinions and shall not be disadvantaged, or subject to less favourable treatment by the college, for the exercise of that freedom.

Institutions have an obligation to facilitate academic freedom and not to punish any academic for exercising this right. The legislation quoted above does not specify how HEIs will fulfil their obligations in respect of academic freedom. What is an acceptable part of academic life, for example, engaging with the education and training needs of the workplace may for some academics be construed as an exciting opportunity to extend the boundaries of their knowledge or for some as forcing an instrumental view of knowledge production on them. For some academics the role of the organisation in

defining the learning needs of the individual may "override or occlude attention to the needs of individual learning workers" (Casey, 2003, p.624).

Some argue that academic freedom remains "inward-looking and self-referential" and is "ultimately freedom for the academic" (Nixon, 2001, p.81). Academic capitalism may result in researchers withholding research findings in order to facilitate the benefit of these findings being transferred to the private sector for a financial benefit. Some question whether such action puts the work of the academic into the realm of "knowledge privatization and profit taking in which institutions, inventor faculty and corporations have claims that come before those of the public" (Slaughter and Rhoades, 2004, p.29).

Academic freedom continues to be important to the academic community (Bennich-Bjorkman, 2007). A study of academic researchers undertaken by Bennich-Bjorkman indicates they place importance on the freedom to select research projects and to shape the direction of those projects. What is also considered important is the freedom to publish the results of research regardless of the findings. This desire to publish regardless of the research outcomes highlights a potential difference between academic research and research carried out in the private sector. The study also identifies a 'social' freedom which some academics constructed as freedom to organise their working day and interaction with colleagues. It has been suggested while behaviour may change "sociological research has shown that norms and values are generally speaking, less susceptible to change than patterns of

behaviour" (Bennich-Bjorkman, 2007, p.356). Just like the academic researcher who obtains external funding from a sponsor in order to undertake research, a WBL academic practitioner potentially also has a challenging role to develop and deliver a WBL curriculum which is viewed as a 'success' from the perspective of the employer and students while also protecting the academic integrity of the programme. In the case of researchers who submit research proposals to a competitive tendering process, there are indications that researchers adapt their proposals to meet the criteria of potential funders:

> The image that emerges instead is that research funding has encouraged dexterity in 'packing' research in various ways depending on the addressee. Once again 'double bookkeeping' is an appropriate image: the institutions demand the presentation of one aspect externally while another or a somewhat different course is being followed. (Bennich-Bjorkman, 2007, p.335)

The research undertaken by Bennich-Bjorkman (2007) suggests that members of the academy may adopt the language of particular stakeholder they wish to appeal to and thereby circumvent having to make any substantive changes in either values or norms.

Higher education's role is multifaceted requiring it to adopt multiple personalities in order to appeal to and meet the expectations of many stakeholders. For the university meeting or balancing the demands of stakeholders, which as suggested by Singh (2007) involves the capacity for both stability and change, makes for a complex and demanding academic work environment.

3.3 Challenges for academic protocols for knowledge production

Gibbons et at (1994) suggest the advent of Mode 2 knowledge production has not only introduced new knowledge producers located outside of the academy, but also that the purpose and process of knowledge production has been reconfigured. If you accept the traditional view of the role of the academy as producing knowledge within the confines of academic disciplines conducted in the spirit of discovery, unfettered by concerns of immediate application, then Mode 2 knowledge production poses challenges for the academy in respect of its role and its processes of knowledge production.

3.3.1 The challenge of codifying knowledge

Eraut and Hirsh (2007) have attempted to clarify confusion around the term 'knowledge' and have observed that this term is used in different ways. The 'narrowest' definition of knowledge relates to codified knowledge (knowledge which is stored in various forms of publications). For a minority for something to count as knowledge it must be "treated as true or postulated as true". In order to access codified knowledge users need skills such as the ability to reason. These have been designated the "practical knowledge of formal education". Occupations have 'generic' and 'specialised codified knowledge' and 'practical knowledge'. These different forms of knowledge are likely to have been gained through different means with some of the knowledge acquired informally, for example, through social or work-related interactions. The unconscious acquisition of knowledge is described as implicit learning. (Eraut and Hirsh, 2007, pp. 5-6).

In his examination of issues surrounding the development of professional knowledge Eraut (1994) alluded to the difficulties of separating propositional knowledge from practical know-how. While it may be possible to reflect on tacit knowledge it may be difficult to articulate it in a propositional form, "When people are asked to describe what professionals do or to examine the nature of professional action, the result will be a list of processes". In order to undertake professional action professionals engage in:

- Acquiring information;
- Skilled behaviour;
- Deliberative processes, e.g. , planning and decision making;
- Giving information; and
- Metaprocesses for directing and controlling one's behaviour.

(Eraut, 1994, p.107)

Professional action involves the ability to retrieve and use propositional knowledge (Eraut, 1994). However, while professionals may acquire propositional knowledge through participation in higher education and develop process knowledge via practice it may not be possible to capture all process knowledge through codification (Brennan and Little, 1996). The work of Eraut (1994) and Brennan and Little (1996) suggests that professionals may, through both formal and informal learning, have acquired knowledge and skills. However it may be difficult, if not impossible, to separate or codify all of their learning into a body of knowledge. Eraut's research on developing professional knowledge highlights the challenges which confront new forms of learning such as WBL when the prevailing

culture promotes learning which "involves the explicit acquisition of externalized codified knowledge" (Eraut, 1994, p.39).

The foundation of professional associations preceded the development of professional education in universities. The development of links and relationships on the part of professional associations supported the codification of professional knowledge bases as well as providing university accreditation to students (Eraut, 1994). The development of professional education with the university highlights the evolving nature of the university's relationship in serving society and integrating the initial education of professionals, who are being prepared to enter practice, into the activities of the academy. The challenge of codifying process knowledge may be due to a number of factors, for example, lack of research taking place in the workplace, the need to develop new approaches to codify process knowledge, and the possibility that some process knowledge will continue to defy codification.

Eraut (1994) has outlines the characteristics of academic knowledge as being "specialised language, preponderance of theory, citation of other work, epistemological authority, and expectation of learning". He has also indicated that "academic contexts are dominated by written work so that knowledge requires an ability to write" and also "academic contexts are imbued with the ideal of open-mindedness". (Eraut, 1994, pp.33-34). Eraut argues that his research on the study of professional learning indicates it is difficult to separate knowledge production and application. He is critical of the academic

tradition of defining knowledge "according to the criteria of the research community alone – as codified, published and public" (Eraut, 1994, p.54).

In order to capture the different forms of knowledge which an individual employee potentially may possess the terms 'personal knowledge' has been coined. Personal knowledge includes:

> Codified knowledge in the form(s) in which the person uses it
>
> Know-how in the form of skills and practices
>
> Personal understanding of people and situations
>
> Accumulated memories of cases and episodic events
>
> Other aspects of personal expertise, practical wisdom and tacit knowledge
>
> Self-knowledge, attitudes, values and emotions.
>
> (Eraut and Hirsh, 2007, p.6)

The focus on the development of skills amongst employees has caused confusing use of terms such as 'knowledge' and 'skills'. To clarify these terms it has been suggested that 'knowledge is a state' and 'learning is a process'. As learning is an 'invisible process' we can 'infer individual learning has occurred by noticing changes in a person's knowledge. Skills are "processes that use varying amounts of codified and uncodified knowledge". The term 'know-how' has been coined in an attempt to reflect "learned skills as a form of knowledge". Eraut and Hirsh (2007) use the term 'capability' to avoid confusion over the usage of skills or knowledge which demonstrates the challenge and confusion surrounding both the meaning and usage of words such as knowledge and skills. (Eraut and Hirsh, 2007, pp.5-

7)). WBL brings together the language of the workplace and the academy. Eraut and Hirsh's attempt to clarify their meaning is indicative of a challenge facing the stakeholders in WBL in developing understanding among stakeholders of their usage of terms such as 'knowledge' and 'skills' as well as understanding the traditions within which these terms have been defined.

While organisations may indicate they wish to develop a WBL programme which provides their employees with a broader and more liberal education and use language associated with higher level learning, this does not always translate when it comes to an actual WBL programme. It may be "the agenda of managers nearer to the operation is somewhat different to that of senior managers involved in developing policy about employee education". These operational managers need to meet immediate business goals and this may result in WBL initiatives which are narrowly focussed on the immediate development needs of employees and the organisation. (Kinman and Kinman, 2000, pp.5-7.

In WBL curricula the "situatedness of the learner" , that is, the learner is located in a particular workplace in a particular time with distinct requirements, needs to be taken into account. As organisations differ the context of learning needs to be considered and due to the changing nature of work flexibility will be required. WBL Programmes "will necessarily be contested at many different levels" and there may be "tension between workplace requirements and university requirements". (Boud, 2001, p.45).

3.3.2 Challenges to the control of the curriculum and academic identity

Conflicts over "curriculum proprietorship and to the form and content of the curriculum" challenge not only traditional academic control of curriculum development but also challenge academic identity (Solomon and McIntyre, 2000, p. 114). Judgements may be made on the quality of academic knowledge and experience when it is transported to the workplace. Boud and Symes (2000) contend that academic identity may be 'particularly threatened' by WBL as:

> Academic identity is particularly threatened by WBL, when academic knowledge has to be tested in the workplace and where it can be made to look vulnerable and non-viable. In such a scenario, academics find their academic and professional identities challenged.(Boud and Symes, 2000, p.25)

Within Mode 2 knowledge production, as outlined by Gibbons et al (1994), the focus is on the production of knowledge for application; knowledge production cuts across disciplinary boundaries and is socially distributed. The 'unhelpful binaries' surrounding knowledge production have been challenged and it has been suggested the liberal university was always involved in 'real world' application, for example, in its long history of involvement in educating students for entry to the professions (Usher, 2000).

Hager suggests that:

> The reason why work-based learning directly confronts common conceptions of knowledge is that academics typically have believed that for something to count as knowledge it needs to be acquired by due academic processes. (Hager, 2000, p.47)

According to Hager 'due academic processes' involve processes acceptable to the academy for knowledge production and transmission. Within the

context of knowledge production the academy utilises 'academic protocols' to develop 'objectified processes' which support the production of 'revisable bodies of knowledge'. Academic processes for the transmission of knowledge are understood by the academy as those relating to the selection of students, curriculum, teaching methods and assessment/progression. Hager has challenged what he has called 'rival knowledge scenarios' and critiques a binary scheme of knowledge production (that is as proposed by Barnett, 1997) indicating while it may describe alternate ways of knowing it would be more useful to view binaries as ways of understanding 'two different worlds' and 'two different kinds of competence'. (Hager, 2000, pp.47-.49). Hager may be arguing for appreciation of the contribution of each 'rival' version of knowledge production rather than dissent over whether there is an absolute version of knowledge production and a single way of knowing a singular world.

The academy has always been involved in the preparation of students for work especially for employment in the professions (Boud and Symes, 2000; Usher, 2000). Thus the notion of the academy preparing students for occupations involving practical and real life application is not new or a new activity for it. As outlined earlier the supplying to society of a well educated populace represents the academy's 'social responsibility' to society (Scott, 2000). Essentially the academy is involved in the preparation of individual students *for* work and as a by-product contributes to the "intellectual capital of a future employing organisation" (Garnett 2001, p77-78). Two differences may arise in respect of the purpose and nature of a work-based learning

curriculum and these relate to (i) models of work-based learning may involve the participation of an employer in decisions related to the purpose and nature of the curriculum (ii) work-based learning programmes may involve learning *at* work (that is the site of learning may be the workplace) and *through* work (Brennan and Little, 1996). The academy has been involved in the preparation of students *for* work and the preparation of students *through*, for example student placements in industry (Brennan and Little, 1996). Models of WBL which involve an employer, a HEI and student/employees potentially involves not only learning *through* and *at* work, but also learning which is intentionally closely connected to the employee's actual work within their organisation and is not part of a student's experience of work. This construction of the purpose and form of the curriculum may present pedagogical challenges and difference over the educational needs of the students versus the organisation. An employer's involvement in participating and influencing the development of the curriculum may challenge academic freedom and threaten 'curriculum proprietorship' and 'control over the content and form of the curriculum' (Solomon and McIntyre, 2000). WBL opens up debate on what concepts, such as academic liberty and the provision of a liberal education, mean for the academy and students when HEIs engage in WBL collaborative relationships with employers. On becoming employed by HEIs academics, become not just an employee of a particular institution but also part of a disciplinary community. The shaping of their academic identity may have begun during the academic's period as a doctoral student (Henkel, 2000). During this period students may become teaching assistants and gain "access to various kinds of knowledge, tacit and informal as well as

formal, connections in the university and in the disciplinary network" (Henkel, 2000 p. 161). It may be overlooked that becoming part of any community, including academic ones, involves learning on the part of the new entrant and:

> Activities, tasks, functions, and understandings do not exist in isolation; they are part of broader systems of relations in which they have meaning. These systems of relations arise out of and are reproduced and developed within social communities, which are in part systems of relations among persons.(Lave and Wenger, 1991, p.53).

Thus the activities of the community may not simply represent the work in hand but may also be a reflection of how the community promotes and perpetuates its existence. The new academic is "defined by as well as defines these relations" within their community (Lave and Wenger, 1991 p.53). Part of the socialisation of academics involves not just learning and understanding the formal codes of conduct but also understanding the nuances of informal rules which may exist within a community (Becher and Trowler, 2001).

Through their experience as doctoral students many academics learn the importance of developing a publication record in order to be successful in getting their first academic position (Henkel, 2000). In Ireland up to recent years a publication record was of more importance for academics seeking employment in the university sector as compared to the entry requirements for those seeking entry to the institute of technology sector. Gaining recognition from peers is important to academics with "a common finding of studies of what motivates academic researchers that what moves them is primarily factors intrinsic to the discipline itself, particularly the desire to

develop a reputation in the field and to contribute significantly to it" (Becher and Trowler, 2001, p.75). Ironically academic life promotes "institutionalised individualism within a community of peers" (Henkel, 2000, p.13). Thus academics seek individual recognition through a peer review system, which at a minimum grants them acceptance and recognition with their peers, and may in some cases enhance their status among their peers. While on the one hand this system promotes and protects standards of research it may also encourage compliance. Researchers may tailor their work to suit a particular research trend or to fit with the publication requirements of peer review journals. A paradox of the academic community is the "coexistence of radical chic with entrenched conservatism" with:

> Resistance to innovative ideas in their discipline is inborn among academic communities, as can be clearly shown by the length of time it often takes for a major insight or discovery to gain general acceptance.(Becher and Trowler, 2001, p.97)

Some argue that conflicts over WBL within the academy are not primarily epistemological but that WBL causes a 'play' on the academy's system which requires it to change existing structures and this results in tension within it (Usher, 2000). Within institutions a peer review system is utilised to control the approval and validation of academic programmes. Within the Institute validation panels for major awards include external and non-academic representatives who are invited by the Institute to participate on the validation panel. It could be argued that while the peer review system was constructed to protect academic standards it may at times prevent or inhibit the development of innovative programmes.

Others argue that WBL has the potential to bring about a sharing of the intellectual capital of employers and universities (Garnett, 2001). Organisations possess three forms of intellectual capital, that is, human, structural and client capital. Human capital is the knowledge and capabilities possessed by individuals and groups. Structural capital relates to how organisations codify and share knowledge. Client capital is the systems and processes by which organisations access the human and structural capital of client organisations, such as partners and suppliers (Garnett, 2001). An example of organisations enhancing their intellectual capital through a joint endeavour is exemplified in a work-based learning project undertaken by Middlesex University in partnership with an employer. Middlesex University through working with an employer enhanced the structural (a course) and human (employees) capital of an employer by using its structural capital (accreditation system) and thereby enhanced the structural capital of the university by the development of a model of partnership (Garnett, 2001) .

3.3.3 WBL and recognition

HEIs may not give equal status to the importance of the "trilogy of teaching, research and services, but when it comes to making judgments about professional performance, the three rarely are assigned equal merit" (Boyer, 1990, p. 15). For practitioners who participate in WBL projects but do not engage in research for reasons of choice or adequacy of resources, they will rely on their immediate colleagues and institution to provide recognition. Research has identified that newly recruited lecturers do not equate teaching as being representative of scholarly activity and these lecturers have

"subsystems which lead to preconceived notions of teaching, research and professional development". To understand how academic professional development occurs notice has to be taken of the environment and reward system which are encountered by academics. (Nicholls, 2005, p.623).

The work of Eraut (1994) and Hager (2000) has highlighted the challenges and issues surrounding academic protocols for knowledge production. Eraut (1994) has identified the difficulties of translating process knowledge into codified or propositional knowledge. Hager considers academic protocols surrounding knowledge production emphasise adherence to the production of "continually evolving, public, justifiable but revisable bodies of knowledge" (Hager 2000, p.48). Criticism has been made that higher education is too focussed on debate surrounding knowledge binaries and that there is merit in viewing different types of knowledge producers and their knowledge as ways to understand different 'worlds' rather than as the academy's competitors (Hager 2000).

3.4 Higher education and WBL partnerships with employers

3.4.1 Defining the changing relationships with employers

In the United Kingdom two discourses promoting the development of WBL, that is, the discourses of partnership and flexibility have been identified by Reeve and Gallacher (2000). Both of these discourses are reflected in policy drivers in Ireland which are promoting closer relationships between HEIs and employers and exhorting HEIs to adopt a flexible, efficient and responsive approach to the development and delivery of programmes (NCPP Forum of

the Workplace of the Future, 2004; Enterprise Strategy Group 2004; Forfás EGFSN, 2011). When I was involved in supporting engagement between the Institute and industry the terms 'partner' and 'partnership' tended to be used loosely in everyday conversations around our work with employers/professional bodies, as well as having legal meaning when the Institute formalises a substantive relationship with an external organisation through a formal partnership agreement. As outlined in Chapter 1, within the Institute the term 'industry' encompasses engagement with private and public sector employers as well as professional bodies. Boud's definition of WBL states:

> WBL is the term being used to describe a class of university programmes that bring together universities and work organisations to create new learning opportunities in workplaces. Such programmes meet the needs of learners, contribute to the longer-term development of the organization and are formally accredited as university courses. (Boud et al, 2001, p. 4)

Boud's definition touches on both the nature of the relationship and its purpose, that is, the bringing together of an employer, a university, and learners which will result in new learning opportunities of benefit to the learners and their organisation. The marketisation of higher education is resulting in direct communication between HEIs and industry. Relations between higher education and employers are changing and higher education is now directly marketing its goods and services to industry without the use of intermediaries such as government bodies:

> Indeed, the new element is not only that direct contacts between the academic and the entrepreneurial worlds have increased, but that such contacts are coming to resemble more and more a dialogue between equal partners. It was not like this a short time ago: the interests, objectives and styles of the two worlds were distinctly differentiated, and those differences were looked upon as legitimate ones. Nowadays universities are more and more regarded by both enterprises and governments as institutions that are to be devoted to the 'national good' of economic competitiveness rather than to the 'universal good' of knowledge. To the extent that this perspective is socially accepted, the boundary between academia and industry becomes blurred. This reflects itself in the concrete linking modalities: the dialogue between equal partners takes place because one of the actors has agreed to speak the other's language. (Sutz, 1997, p.12)

Sutz (1997) suggests higher education is entering into relationships with industry partners and that there is now an expectation of equality of status among partners.

The strategic plan of the Institute where this research study took place commits to serving the needs of a diverse range of students with an emphasis on preparing students for careers by providing them with an education which is informed by the Institute's strong connection with industry. A basic premise for the provision of some services through public subvention is to avoid market failure and prevent a situation arising where some members of society are unable to access or afford a particular service. Interpretations as to what is a 'public good' suggest it is a "good that people can consume without reducing what others consume" (Hufner 2003, p.339). What is less clear is how a public service provider should act when some members of the 'public' have greater potential to contribute to the operation of their service which facilitates a service provider being able to sustain or expand its services to the general public. Equally should you discriminate against a stakeholder

in society, for example, a for-profit private sector company, simply because it is in a stronger position to pay fees to an institution, or automatically assume that being dedicated to profit making implies an organisation is devoid of principle? It might not be unreasonable for industry to expect higher education to support the development of the workforce. Increasingly higher education is being encouraged to seek alternative sources of income and an obvious source of this alternative income is likely to come from interaction with industry.

Partnerships and the place of students/employees

In the Institute where this research study was conducted when a relationship with a company becomes a contractual one, the Institute and the partner organisation are named as the two parties to it. Generally the contract outlines the fee to be paid by the organisation and the services to be provided for this fee (for example, the nature of the programme and arrangements surrounding its delivery) It could be construed that the employee as an individual become subsumed into the learning needs of the organisation which "privileges the organization as the learner" (Casey, 2003, p624). In my experience it is generally the employer who funds the WBL programme and formally selects or approves the participation of the employee on the programme. A question arises as to the degree to which the knowledge needs of the student/employee are met from either the perspective of their role as an employee or their personal needs. Experience may vary in this regard, for example, within some WBL partnerships students/employees negotiate a learning agreement /plan which they construct themselves (Boud, 2006;

Costley and Armsby, 2007). The question arises whether such agreements made by publicly funded institutions result in a collectivising of the needs of these individual students and thereby a subsuming of individual needs of some members of the 'public'. A counter argument can also be made that without the support of their employer some members of the public would be unable to access higher education, and if HEIs do not engage with employers they are preventing employees from accessing higher education. HEIs "with the least status are those that are the most dependent upon public funding" while institutions with the most status attract the most private funding and have the greatest aspiration to freedom from state controls" (Tight, 2006, p.255). The ability to attract significant amounts of funding may be a double-edged sword for HEIs constraining institutions to meet the expectations and needs of funders while also enhancing their status and ability to operate more independently from the state.

It is assumed students attend higher education on a voluntary basis, and although not immune to influence, self-select their programme of study. Within the WBL partnership the employer selects the programme and the student/employee participants. A tenet of higher education is that participation enhances the life of the student. It might be implied that participation on a WBL programme is not developmental in the broadest sense of a student's life rather it is potentially fulfilling a remedial role addressing individual deficiencies as identified by an organisation. May be from either the perspective of higher education or an employer it is unrealistic to expect the workplace to be an "educational space for 'deliberative

democracy', in which citizens learn, on their own terms, to be active in their own communities" (Martin, 2003, p.573-574).

As outlined earlier, a question has been raised as to whether WBL programmes are being linked to "pay packets and performance awards" (Solomon and McIntyre, 2000, p.114). It is difficult to ignore that within the context of working life employees' performance is subject to appraisal. What is unknown is whether WBL programmes result in some students/employees interpreting their selection, or non selection, as a reflection of their existing or potential performance levels, or value to the organisation. The challenge for the individual academics is how they address this issue within the confines of WBL partnerships while also being a constituent of a wider academic community which may hold different beliefs surrounding the *raison d'être* of student participation in higher education and the role of academia in facilitating this participation. Is it possible to meet the aspirations of the two traditions of lifelong learning, that is, "one concerned with the development of human capital" and the "other concerned with the promotion of social justice" (Walters and Watters, 2001, p. 471).

Traditionally HEIs have had a direct relationship with students. Barnett (1994) emphasises the importance of communication structures within higher education and identifies these as:

- Student-student
- Lecturer-student
- Lecturer-lecturer
- Lecturer-administration
- Academics-state bureaucracies
- Academics-wider society

(Barnett, 1994, p.9)

I would add to Barnett's (1994) communication structure the role of an employer, within the confines of a WBL partnership, where the employer may act as an intermediary or communication filter between the lecturer and the student. I speculate whether in the case of some WBL partnerships initiatives there has been a shift to:

- Lecturer-WBL employer constituent-student.

It has been suggested the arrangement between higher education, knowledge and society has been reconfigured (Barnett, 1997). Any re-configuration between higher education and other stakeholders such as other knowledge producers may simply be part of a natural and continuous process of adaptation.

Partnership and new structures and communities

Roles and relationships between higher education and employers are being re-shaped resulting in new forms of relationships and partnership (Barnett, 1997; Sutz, 1997; Rhoades and Slaughter, 2006). Higher education, through the massification of higher education, has it could be argued, orchestrated the emergence of new knowledge producers. Knowledge used to enter society via HEIs. The new configuration sees knowledge entering higher education from other knowledge producers in society (Barnett, 1997).

Higher education is now engaging new professionals recruited for the purpose of promoting interaction between it and industry. I am one of these new professionals and prior to institutional re-structuring was promoting and facilitating interaction between the Institute and industry. The basis of this interaction is that it is self-financing with the aspiration that some engagements may generate a profit. Some may automatically construct my former role as being representative of "the push for universities to generate more of their own revenues" with institutions "increasingly hiring professionals to manage various relationships with the business world and to develop and enhance revenue streams beyond state allocation" (Rhoades and Slaughter, 2006, p.16). In the context of WBL, academic 'community' may be less about 'locality' and centred more around "interacting people" with the possibility of being a member of more than one community with short/long term membership of different communities as a possibility (Finnegan, 1994, p.187). A suggestion that universities reflect the equal status of partners in WBL initiatives by symbolically using both institutional and company logos on awards (Smith and Betts, 2000) presents challenges for promoting partnerships while also maintaining institutional autonomy in respect of the setting of educational standards and the granting of awards.

Partnership and the wider academic community

In instances where an industry client wishes to have a programme accredited WBL academic practitioners have to engage with not just academic colleagues involved in the WBL programme, representatives of the industry

client and students/employees but also with the wider academic community in their own institution. There may be an assumption that the rhetoric of higher education serving the knowledge economy is an integrated and unproblematic goal for HEIs and academics generally. Internal institutional policy makers and other academic colleagues are directly outside of the tripartite relationship but are connected with it by virtue of the activity of their WBL colleagues being a constituent of both the tripartite relationship and their own institution. The constituents within the WBL relationship may rely on and need the support of the institutional policy makers and colleagues in order to have a WBL programme accredited.

3.4.2 Different types of WBL curricular frameworks and validating programmes

Four categories of WBL have been identified one of which is relevant to this research study (two of the other three relate to WBL and full-time students and the third relates to WBL where the programme content is designed with the student), that is:

> curriculum framework controlled by higher education institution, focus and content designed with employer – learner primarily full-time employee. (Brennan and Little 1996, p.10)

There is variation in the type of curriculum developed under the auspices of partnership with employers ranging from the utilisation of existing higher educational programmes, customisation of programmes and the development of, for example in the University of Luton, institutional wide frameworks to accommodate WBL across different subject areas. Some institutions in the United Kingdom, for example the former Anglia Polytechnic (now Anglia Ruskin University) and Middlesex University, have engaged in an initial

mapping exercise wherein an employee's work experience was initially mapped against an existing programme. (Brennan and Little, 1996). Some suggest:

> The actual programme design that eventually becomes consolidated within an institution may well emerge from the power relations of the various partners involved in any particular scheme (and the contexts in which they are working) and be some way removed from its initial design, derived from theoretical best practice. (Brennan and Little, 1996, p.14)

As outlined earlier "universities have few problems with WBL until they contemplate its institutionalization" (Portwood, 2001, p.74). Seeking to have a WBL programme validated brings it into the heartland of academia in that it is submitted to be peer reviewed by an institution's formally codified standards as well as any informal or unwritten standards that may prevail. The degree to which both codified and informal regulations are suitable for a WBL programme is of interest, with Portwood suggesting:

> WBL, however, involves radical change. It changes institutional regulations, redefines the institution's curriculum, reconfigures learning relationships and introduces new practices. (Portwood, 2001, p.84)

The experience of the academic involved in a WBL programme which requires them to work through their institution's quality assurance requirements may be a reflection of the requirements of these regulations and also a function of the epistemological beliefs of academic colleagues and their understanding and/or experienced of WBL.

The ability of the WBL academic practitioner to explain and/or defend decisions made by the academy in respect of a WBL programme, for example during the accreditation process, will call on the facilitation and negotiation

skills of the academic to successfully interface between the industry client and their institutional academic colleagues. Beliefs around timeframes for progression may be a source of tension especially with companies expecting completion of curriculum development or validation to be undertaken within a period which coincides with their organisational objectives (Onyx, 2001).

3.4.3 Preparing and supporting partnership with employers

The experience of the University of Technology Sydney (UTS) highlights a number of issues which arose during its implementation of WBL for the first time. At an institutional level UTS has a commitment to providing flexible learning opportunities to students as well as "a general commitment to professional and work practice as an integral aspect of the learning environment in all its faculties". During the course of developing a WBL programme with an employer partner academic staff met a number of 'impediment issues'. While the publicity surrounding the initiative "used the discourse of partnership involving a triumvirate of interests, the employer as a corporate client, the university as a service provider, and the employee as a student", positions and interests were at times conflicted some of which manifested in expectations surrounding timeframes for accreditation. This particular partnership included the commercial wing of UTS the purpose of which is to generate income for the university. Internal tensions arose regarding progressing the development of the programme, difficulties surrounding costing the programme, and confusion surrounding the role of other academic personnel. Due to client confidentiality matters surrounding the programme could not be discussed with academic colleagues outside of

the programme team. There were also challenges surrounding recognising learning embedded in practice (which was of interest to the employer) and recognising the importance of theory, critical thinking (of importance to UTS). (Onyx, 2001, pp.126-153). Among the conclusions drawn from the UTS experience are:

> The successful implementation of work-based learning requires considerable skill and courage on the part of all involved within the partnership organizations and within the university. The lessons that can be learnt from our experience suggest that we have not recognized the importance of adequate staff development of both university academics and workplace supervisors. We need joint briefing sessions that describe the multiple roles that are involved in work-based supervision. We also need better mechanisms within the university to ensure transparency of process and better collaboration between administration units and faculties. We need to find more effective ways of helping student participants to move to a self-reflective, critical, self directed learning paradigm. (Onyx, 2001,pp.126-153)

The experience of UTS suggests aspirations surrounding engagement with employers and flexible delivery need to underpinned by initially considering what these aspirations involve in real terms and that implementation needs to be buttressed by appropriate supports.

3.5 The challenges the workplace presents for programme delivery and learning

3.5.1 Differences in beliefs about and approaches to learning

As outlined in the last section, Eraut and Hirsh (2007), in discussing the debate surrounding knowledge and skills, propose that 'knowledge is a state' and 'learning is a process'. We can infer learning has taken place by observing change in a person's knowledge. Two interesting issues are raised by Eraut's work and one was discussed earlier, that is, the challenge of codifying tacit knowledge and skills. The second issue relates to the different

beliefs which may be held about how students learn. Criticism has been made against the dominant discourse on learning which constructs learning as a product. The learning as a product discourse focuses on students' minds being filled with knowledge and implies the products of students' learning can then be assessed using a uniform but mainly individualised system. The learning as a product discourse assumes the "products of learning to be relatively stable over time" (Hager, 2003, p. 2).

Sfard's seminal article on learning opens with the words "Theories of learning, like all scientific theories, come and go" (Sfard, 1998, p. 4). In her work on learning Sfard posits that there are two dominant learning discourses, which she designates the 'acquisition metaphor' and the 'participation metaphor'. The learning as acquisition metaphor reflects the learning as a product discourse with its subordination of the "process of learning to its products" (Hager, 2003, p.5). Learning as participation sees learning as a process in which student's performance is enhanced not only through the engagement with tasks but also that this engagement involves interaction with other people (Felstead, Fuller, Unwin, Ashton, Butler, and Lee, 2005). Sfard counsels against viewing one learning metaphor as superior to another and calls for acceptance that different learners and learning situations may require the use of different approaches to learning. Sfard also invokes researchers to accept:

> our work is bound to produce a patchwork of metaphors rather than a unified, homogenous theory of learning, the better for us and for those whose lives are likely to be affected by our work. (Sfard, 1998,p.12).

Sfard's work has been critiqued and it has been suggested the learning as participation metaphor does not adequately capture the change factor of learning and "learning as process of construction (re-construction)" better reflects the "construction of the learning, of the self, and of the environment (world) which includes the self" (Hager 2003, p.6). Criticism has been levelled against the academy that its focus on the products of learning results in it neglecting to examine deficiencies in these products, for example, success in the assessment system does not guarantee students will be able to transfer their learning to the workplace, and the assessment system may promote surface, as against deep, learning (Hager, 2003).

3.5.2 The complexity of learning in the workplace

Among the challenges WBL presents are:

> The difficulty of separating learning from work practices especially due to the fluidity of the work environment;
>
> Experience is part of and embedded in learning. Reflection on what has been learnt may only take place when a task is finished;
>
> The context of roles and the work environment impact on learning. Context includes such issues as organisational culture and social relations within organisations;
>
> Completing tasks and social relations are integrated in the work process. (Collin, 2006, pp.404-405)

The challenges and complexity of WBL, as outlined above, raise important questions as to not only the codifying of experiential learning taking place in a dynamic work environment which has implications for the assessment of WBL, but also how higher education develops its understanding of the workplace environment in order to apply pedagogical strategies which facilitate WBL. Aspects of the work place environment, such as

organisational culture and workplace supports for learning, may be outside the remit and control of a HEI yet may impact on the learning environment for the students. It has been suggested collaborations between organizations and HEIs present opportunities for "making tacit understandings of skilled workers more explicit, which may mean periods of formal instruction" (Tennant, 2000, p.127). Research on WBL highlights the necessity of understanding the collective nature of learning in the workplace (Collin, 2006) and also the importance of having clarity surrounding the roles and responsibility of stakeholders (Costley, 2001).

3.5.3 The challenge of teaching and learning on WBL programmes

WBL may challenge academic identity due to academic knowledge being deemed inadequate when presented to students who are also employees (Boud and Symes, 2000). The inadequacy of academic knowledge raises the issue as to what constituents a teacher-student relationship. It has been suggested the teacher-learner relationship needs to be "centred on the co-construction of new learner/worker identities" (Tennant, 2000, p.129). Research undertaken by Kinman and Kinman suggests that students/employees who possessed significant experience of work but little experience of higher education had expectations in respect of the role of their lecturers supplying learning materials and supports while also questioning the relevance of material asking "What's that got to do with making motor cars?" (Kinman and Kinman, 2000, pp.12-13). WBL may require learning support skills for both students/employees and also lecturers and this may involve, as suggested by Tennant, a willingness to co-construct the student-teacher relationship.

The challenge of transferring the learning derived from participation in formal educational programmes to practice is a source of employer dissatisfaction with higher education:

> Employers are increasingly recognising that one reason why the development of their staff does not result in tangible learning is that it is frequently divorced from the workplace. Research indicates that over 70% of learning comes from experiences, either planned or unplanned, thus emphasising the need to 'learn from real work'. Such learning is also seen as a means by which the economy can respond more rapidly to changing skill needs, when compared to 'campus-based learning'. **Yet from an academic perspective, work-based learning remains a contested area,** not least because it challenges the very essence of universities as the primary source of knowledge. (Higher Education Academy , 2006, p.22, bold as per Higher Education Academy)

Earlier the challenge of codifying tacit knowledge into a body of knowledge which facilitates its recognition by the academy was discussed. Aside from this challenge supporting students to capture and reflect on their own knowledge and experience may result in a "reshaping of the identity of academics as they grapple with their role as 'interpreter' of knowledge of the workplace" (Gustavs and Clegg, 2005, p.23).

As proposed by Gibbons et al (1994), Mode 2 knowledge production is focussed on the early application, or end use, of knowledge creation. In the context of learning students on a WBL curriculum may want to be able to see the immediate relevance of elements of a programme to their role or industry sector. Research undertaken by Kinman and Kinman outlined how students questioned the relevance of material to their particular sector. Their research also highlights how students/employees experienced difficulty in

understanding academic language and also seeing the relevance of learning about theoretical matters:

> One participant explained: 'Not that they (the lecturers) don't speak English, or that we don't, but our language is different – the way we interpret what we see and what we write is totally different. This is the way we are trained. Another participant, himself an experienced systems analyst, sought to describe his bemusement by one of his more 'academic' lecturers, after listening to a philosophical discourse on theoretical approaches to system design: 'you understand every word he says but you have no idea of what he is really talking about'. (Kinman and Kinman, 2000, p.15)

In the same case study, academic staff on the WBL programme "struggled to understand the jargon-laced language, let alone the behavioural norms" of groups in the client company. Lecturers who did not have industrial experience or were unused to working with senior managers found "the group difficult to handle'. (Kinman and Kinman, 2000, p13).

Differences and difficulties surrounding academic and industry language have also been identified by research undertaken by the Higher Education Academy (2006). Aside from the academy and employers learning to speak each other's language, understanding the purpose of providing students with theoretical knowledge requires willingness to:

> establishing an appropriate balance between theoretical and disciplinary-based knowledge and the practical know-how desired by participating organisations represents a central challenge for staff involved in planning these initiatives.
> (Garrick and Kirkpatrick, 1998, p.180)

For the academy to recognise learning it requires the translation of tacit knowledge into a codified form. The converse of translating codified knowledge into tacit and informal knowledge in order to develop professional expertise "to make it possible for an expert to make

decisions in an intuition-like-way' is the other side of the coin (Slotte and Tynjala, 2003, p. 452). The development of professional expertise can be achieved by the integration of theory and practice and problem solving. Students/employees should be encouraged to theorise practice and particularise theory which would allow them to bring their practical experience into the classroom and equally to apply conceptual and theoretical frameworks to real work situations. (Slotte and Tynjala, 2003). In respect of students' transferring learning to the workplace research suggests that supporting students to transfer theory to practice is frequently presented as a single movement with the words 'from theory to practice' regularly used. The "longstanding language of 'transfer' hinders rather than facilitates the search for solutions to the 'theory-practice' gap" (Evans, Guile, Harris and Alan, 2010, pp.245-251).

Academics engaging in WBL programme development and delivery with employers confront a number of challenges. HEIs, employers and students/employees approach WBL from different cultural, epistemological and pedagogical perspectives. This is coupled by academics facing "competing demands upon time" which "are a major constraint on the ability to develop and maintain external linkages". Getting the balance right between the 'business' and 'academic' side of a WBL programme requires the engagement of stakeholders and the resources to engage. (Slotte and Tynjala, 2003, pp.447-457).

3.6 The conceptual framework

A conceptual framework is an important element of research design as it:

> explains, either graphically or in narrative form, the main things to be studied – the key factors, constructs or variables – and the presumed relationships among them. Frameworks can be rudimentary or elaborate, theory-driven or commonsensical, descriptive or casual. (Miles and Hubermann, 1994, p.18)

Developing a conceptual framework has been compared to the pre-planning involved in taking a holiday in that it focuses the researcher on reaching and returning from their destination and also while on 'holiday' making the most of their trip (Vaughan, 2008). Developing a conceptual framework is not easy and can be challenging for novice researchers undertaking doctoral study (Leshem, 2007). I found it challenging and this experience is described in the next section.

3.6.1 Developing the conceptual framework

My motivation to undertake this research study was inspired by two influences. Firstly, my professional experience of working with academic colleagues and industry clients (which in my role in the Institute included public and private sector employers and professional bodies) facilitating the development and delivery of WBL curricula and encountering challenges in fulfilling my role. Secondly, my personal interest in the potential of collaborative relationships between and other stakeholders to facilitate access to education. In order to undertake a research study in the field of WBL I needed to develop a conceptual framework which would inform the development of the research questions and also focus and bound the research study. The development of the conceptual framework and the research

questions did not follow a tidy linear path and the only clarity which was there in the early stages of this research study was, as suggested by Vaughan (2008), that the initial struggle to develop the conceptual framework would eventually pay dividends in supporting the undertaking of the fieldwork and the analysis. As discussed in Chapter 2, the Contextual Review, prior to conducting the field work the initial Contextual Review had informed the development of the conceptual framework, and had considered the forces influencing the role of higher education, and the development of WBL. The onset of the recession in Ireland in 2008 heightened the importance of some of these forces. The original drafts of the Contextual and Literature Reviews became annotated with reminders in respect of emerging developments and their possible relevance for this research study. I learnt that in developing a conceptual framework it is necessary during the research study to remain alert to new developments which may be relevant to the research study.

3.6.2 Inputs to the conceptual framework

The inputs to the conceptual framework included:

(i) My professional knowledge and experience of the field of WBL;
(ii) Concepts arising from the Contextual Review;
(iii) Concepts arising from the Literature Review.

As the development of the conceptual framework progressed through the undertaking of a literature review, I became interested in giving 'voice' to academic practitioners in the Institute who I knew had many years of experience of working the field of WBL. It became important to me that through this research study I tell their stories. Hence a fourth influence on

the development of the research questions and the conceptual framework was a:

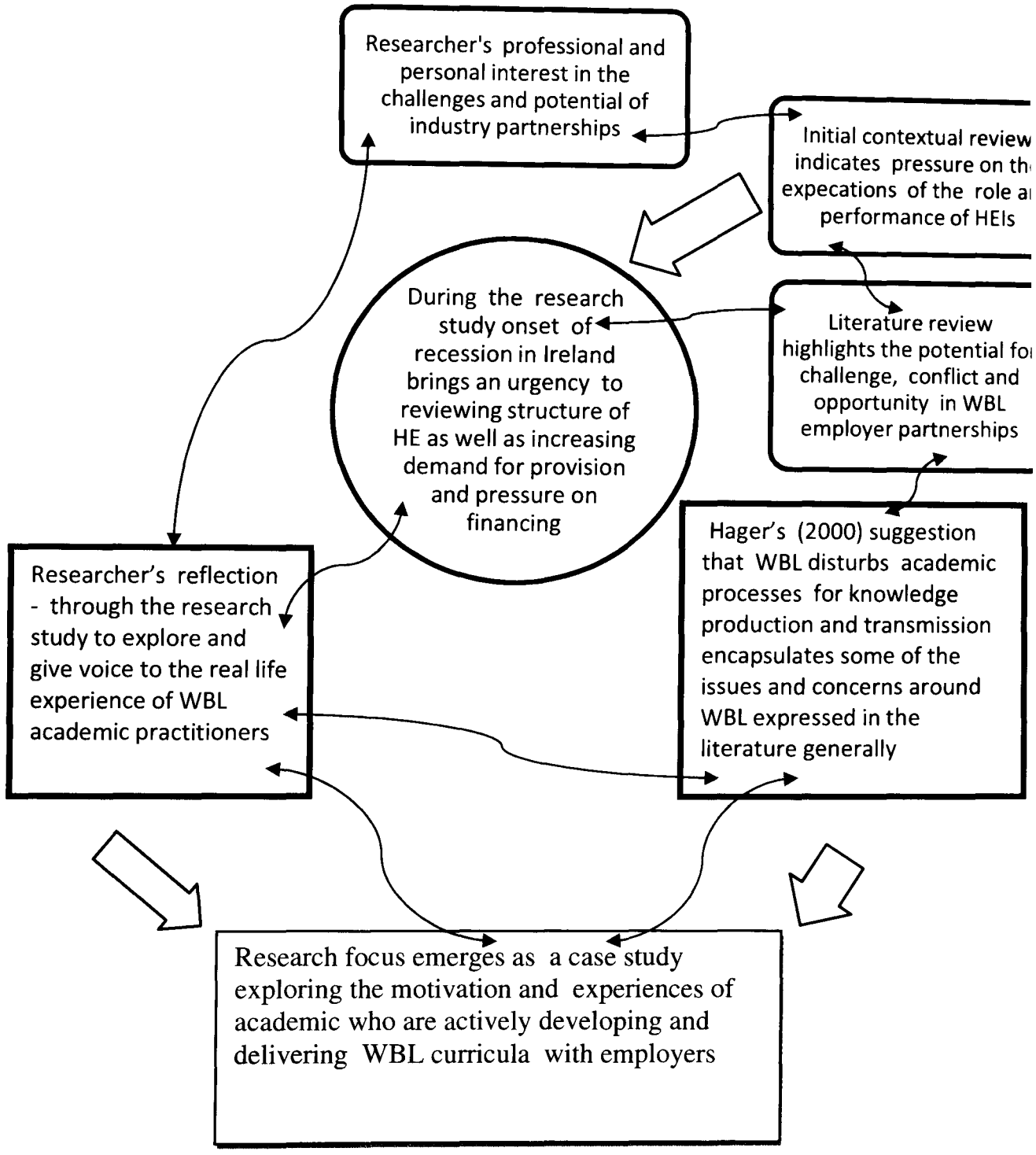
(iv) A wish on my part that the research study would give 'voice' to the experience of academics who engage in WBL with industry;

Finally, a fifth input to the conceptual framework, as discussed above, was the instability of the research environment:

(v) The dynamic nature of conducting real world research required that I remain alert to changes in the research environment which took place as the research study progressed.

The above were the inputs to the conceptual framework. Using narrative and diagrammatic forms, the next section outlines the framework. Figure 3.1 gives a visual overview in respect of the development of the conceptual framework with the main concepts and issues discussed in the next section.

Figure 3.1
Development of the conceptual framework



3.6.3 The conceptual framework in respect of this research study

The purpose of this section is to provide a summary of the key concepts and issues which informed this research study.

Shifting expectations as to the role of higher education and the role of the state in the financing of higher education

A prevailing theme in the literature is debate and questioning of the role of higher education, its contribution to economic and societal development, and the role of the state in financing higher education. A number of issues arising from this debate are outlined below:

Firstly, the role of higher education is influenced and affected by the demands of stakeholders external to the university. Up until the massification of higher education participation in higher education was only open to a small number of people in society (Trow 1974). In Ireland it was not until the 1960s that the government started to invest in the development of the higher education system with a view to opening it up to a much larger number of people. The intervention on the part of government to support the development of the higher education system implies it did so in order to avoid the system failing to deliver the service required by society. Thus higher education like other services, such as health, could be considered to be a 'public good' (Hufner , 2003) supported in order to ensure it meets the needs of society. In Ireland the important role higher education played, and continues to play, in developing human capital is long established (OECD 2004). The role of higher education as a provider of not just undergraduates to the labour market has been extended to calls that it also supports the development of the economy by providing upskilling opportunities for those

already in the workplace (Enterprise Strategy Group, 2004; OECD, 2004, NCPP Forum of the Workplace of the Future, 2004; Forfás, 2010; Forfás, 2011).

Secondly, higher education's role in the workplace is back dropped by a financial impetus to source additional funding which some argue is changing or muting the university's service function to the adult population to a commercial activity (Einsiedel, 1998). In Ireland the state provides the majority of funding for the sector. However, in recent years there have been calls for higher education to engage in activities which will generate income and there is a trend towards making the sector more self-financing and accountable for its expenditure (Skilbeck, 2001, OECD 2004). Since the recession all public expenditure is being scrutinized (Government of Ireland, 2010 and 2011) and higher education has like many public services been affected with cost-cutting initiatives such as a moratorium on recruitment.

Thirdly, stakeholders including the higher education sector and its academic constituency understand and interpret the role of higher education differently. It could be argued that the close association between some disciplines with HEIs, for example, law, medicine, architecture and their professional bodies, demonstrates that there is nothing new in students' participation in higher education having a close connection with the needs of their prospective employers. What is possibly hidden from view is the degree to which higher education and or wider society have recognised and accepted a very direct relationship between the role of higher education and the needs of the

workplace. Calls to develop a 'new' relationship between HEIs and the workplace (NCPP Forum of the Workplace of the Future, 2004) are locating the role of higher education not just as the provider of undergraduates but also requiring on the part of higher education to interpret its role as being allied to the day to day needs of organisations and their workforces. There is now a specificity to the role of higher education in respect of workforce development which was possibly less blatant than heretofore. It has been suggested that society requires higher education to be a force of both stability and change (Singh, 2007). Whether the drivers shaping the role of higher education have unintended consequences for its role is unclear.

<u>The role and influence of academic communities of practice and collaborative employer partnerships in knowledge production and transmission</u>

Prevalent in the literature is debate surrounding the role and impact of both academic communities of practice and collaborative employer partnerships on knowledge production and transmission.

The production and transmission of knowledge production are integral to the role of higher education (Scott, 2000; Hager, 2000). Knowledge production requires decisions, and by implication agreement, on a modus operandus. There is a belief that in the past higher education was granted autonomy to direct its own affairs providing it supplied the state with its 'cognitive requirements' (Delanty, 2001). From the perspective of both the academy and society the knowledge provided was value free but valuable (Barnett, 2000). Among the academic community there exists academic protocols for

knowledge production (Hager, 2000) which specify the conditions under which knowledge is produced and tested. The advent of new knowledge producers based outside of the academy (Gibbons et al, 1994) coupled with the desire to develop knowledge economies has pushed the boundaries of knowledge production both outside and inside the academy.

Some of the reasons outlined in the literature as to why engaging in work-based learning initiatives cause difficulties for the academy include:

> Work-based learning interferes with academic protocols for knowledge production and transmission (Hager, 2000);
>
> Academic communities of practice have a strong commitment to academic protocols for knowledge production and transmission and while language/behaviour may change values may not (Henkel, 2000; Paterson, 2003; Bennich-Bjorkman, 2007).
>
> Academics feel vulnerable that their knowledge may be judged and found deficient by external knowledge producers (Boud and Symes, 2000);
>
> Meeting the needs of employers results in a commodification of knowledge (McIntyre and Solomon, 2000);
>
> Meeting the needs of employers may result in the exclusion of some of the educational needs of the students/employees (Casey, 2003)
>
> The service role of adult higher education is being transformed to a commercial activity (Einsiedel, 1998; Gustavs and Clegg, 2005);

There is now a drive for the academy to develop collaborative knowledge production relationships with external stakeholders (Sutz, 1997). Collaborative relationships which involve stakeholders from outside of the academy have also extended to the academy's role in knowledge transmission (Rhoades and Slaughter, 2006). The discourse of partnership invokes higher education to work directly with organisations in order to meet an

organisation's development needs (Reeve and Gallacher, 2000; Boud, 2001). Working in partnership has implications for the communication structures which exist between academics and students as it imports an employer's representatives as a mediator/negotiator between students and the academy. The academic activities associated with knowledge transmission, such as, the selection of students, curriculum, teaching methods and methods of assessment and progression (Hager, 2000) in work-based learning initiatives involving an employer and students/employees, necessitate to some degree, the involvement of an employer in discussions and decisions which are more generally undertaken internally by the academic community.

3.7 Framing the research study

In Ireland due to the recession there is now urgency that higher education is efficiently structured so it can contribute to workforce development thereby contributing to economic revival. Responding to the needs of employers is considered urgent and is likely to create both challenges and opportunities for higher education.

Some of the literature emanates a sense of anxiety and disquiet that when HEIs engage in WBL curriculum development and delivery with employers that traditional academic responsibilities and prerogatives are in danger of takeover by non academic outsiders. There is a sense that the objectives, standards and expertise of these outsiders challenge academic control of the curriculum and academic identity. In WBL initiatives knowledge production and transmission move a number of parties into a temporary and

common 'space' for the purpose of developing a work-based learning initiative. Academics are part of disciplinary communities which have both formal and informal rules which serve to develop a cohesive disciplinary community which supports individualisation providing this is realised within the parameters set down by the community (Becher and Trowler, 2001 and Henkel, 2000). Exploring the experience of WBL academic practitioners may shed light on how they address the challenge of being members of academic communities while working in collaborative relationships on curriculum development and delivery with employers.

Chapter 4

Research Design

4.1 Introduction

This chapter discusses developing a research framework and issues which arose during its development and during the course of conducting the research. It also discusses the challenges which I met as a novice researcher who is also an insider researcher.

4.2 Developing a research framework - the challenge of conducting 'real life' research

The Institute where this research was conducted is an Irish HEI populated by real people the functioning of which is influenced and guided by its history, culture and institutional policies and practices. As outlined in Chapter 2, the Contextual Review, the Institute does not exist in a vacuum. The lives of the Institute's stakeholders are affected by being part of the wider world. This research study was initiated before the beginning of the recession in 2008. In writing up the study it was necessary to revise the Contextual Review to reflect the changes which have taken place in Ireland and abroad which have impacted on the Institute's stakeholders.

At the beginning of this research study I worked as a facilitator and intermediary to promote the development of WBL programmes between industry clients and the Institute's academic community. As outlined in the Contextual Review, Chapter 2, in this role I had met challenges and was also

aware that academic colleagues too experienced challenges when working in the field of WBL with industry. Due to restructuring within the Institute my role has changed and I no longer work in the role as a facilitator promoting and supporting the development of WBL initiatives between the Institute and industry.

So by its nature this research study involves:

> some kind of investigation involving people in 'real life' situations; to draw attention to some of the issues and complexities involved; and to generate a degree of informed enthusiasm for a particularly challenging and important area of work.(Robson, 2002, p3)

Conducting educational research has been described by Berliner (2002) as 'the hardest science of all'. Educational research is criticised as being "too soft, squishy, unreliable, and imprecise to rely on as a basis for practice". In conducting educational research, researchers confront the challenges of contexts, the ubiquity of interactions and the short-life of research findings. (Berliner, 2002, 18).

4.2.1 The objectives of the research study and the research questions

In undertaking this research I had to address whether the research problem is worthy of research. In other words will the research contribute to knowledge and uncover something that was not known before (Bassey, 1995). Educational research has been subject to criticism with allegations that while it costs a lot to undertake "it is not commonly perceived as useful or relevant by those who teach and those who form policy." (Kitwood, 1976, p.70; Gough, 2004). Educational research has also been criticised as not being

scientific or adopting a scientific approach to research (Kitwood, 1976; Berliner, 2002).

The objectives of this research study are:

- To explore the experiences of academics actively engaging with industry on WBL curriculum development and delivery with a view to producing a piece of scholarly work which enhances knowledge in the field of WBL;
- Through the dissemination of this study to give 'voice' to the experiences of WBL academic practitioners with a view to sharing and enhancing understanding of practice;
- To make recommendations in respect of the development of policy and practice in the field of WBL;
- To identify any further areas for research.

The following are the research questions:

1. What motivates academics in the Institute to engage in WBL curriculum development and delivery with industry and how is engagement with industry initiated?
2. When developing and delivering a WBL curriculum with industry what has been the experience of the Institute's academics?
3. Does the experience of the participants in this research study shed any light on the academy's engagement in WBL with employers, and if so, what specific matters are highlighted?

In this research study I would like to contribute some 'informed' enthusiasm and enhance the knowledge of an Institute activity. In addition, as outlined in Chapter 2, the Contextual Review, and Chapter 3, the Literature Review, WBL with industry is an activity of interest to educational and economic policy makers as well as academic practitioners. Through exploring the experiences of participants who engage in, or are connected to, WBL with industry, I hope this research study will inform policy and practice in respect of WBL with industry.

4.2.2 Methodological considerations

In order to undertake research educational researchers need to justify decisions they make in respect of methodology and their research design (Crotty, 1998). As the researcher I had to develop a suitable research framework to address the research problem. In doing so I came to understand that the methodology and the research design adopted might imply to readers of the research that choices were based on my "claims about what exists in the world", my ontological beliefs, and "imply claims about how what exists may be known", my epistemological beliefs (Usher, 1996, p.11). Hence it may be imputed that choices around methodology and research design were informed by me, the researcher, holding a particular theoretical perspective which originated in my epistemological beliefs (Crotty, 1998). As a novice researcher I was comforted when I read the comment by Pallas (2001) that novice researchers can be overwhelmed by the number of beliefs in educational research as to what counts as knowledge. I am only uncovering my own ontological and epistemological perspectives and developing an appreciation of the different perspectives of other researchers. I have come to recognise the value of understanding that there are different ontological and epistemological perspectives held by researchers and these inform the decisions they make in respect of the methodology or methodologies they use in their research. I appreciate:

> ontological assumptions give rise to epistemological assumptions; these, in turn, give rise to issues of instrumentation and data collection.This view moves us beyond regarding research methods as simply a technical exercise; it recognises that research is concerned with understanding the world and that is informed by how we view our world(s), what we take understanding to be, and what we see as the purposes of understanding. (Cohen, Manion and Morrison, 2000, p.3)

It was outlined earlier that the research problem is located in a large functioning HEI in Ireland. The research problem is contained within physical, historical, cultural and organisational spaces which are punctuated and punctured by a multitude of internally and externally based interactions. This research study does not seek to find a 'right' or 'wrong' answer to the research problem. In summary it is argued that case study research best addresses the research problem, the objectives of the research, and the context in which the research problem exists.

4.3 Case study research

Case study design is an approach to research design rather than a single coherent form of research as the theory and practice of case study has been informed by different theoretical perspectives (Stark & Torrance, 2005). It is difficult to provide a single and agreed definition of case study research (Bassey, 1999). One definition, which is described as a 'technical definition' has been provided by Yin (2003) and defines a case study as an inquiry that:

- Investigates a contemporary phenomenon within its real-life context, especially when
- the boundaries between phenomenon and context are not clearly evident.

Case study research is of particular relevance when the researcher wishes to acknowledge and include the contextual issues surrounding the case and in situations where the contextual and the case cannot be easily separated. The challenge of separating the contextual from the case has implications for data collection requiring an acceptance of the use of multiple sources of data thus the attractiveness of case study research is it:

- copes with the technically distinctive situation in which there will be many more variables of interest than data points, and as one result
- relies on multiple sources of evidence, with data needing to converge in a triangulating fashion, and as another result
- benefits from the prior development of theoretical propositions to guide data collection and analysis.

(Yin, 2003, pp.13-14)

Some of the features of case study research resonated with the nature of this research study. Case study research recognises and facilitates research in situations which are real life, evolving and comprise of the "interactions of events, human relationships and other factors in a unique instance" (Cohen et al, 2000, p. 181).

4.4 Case study research and data collection and analysis

This section defines the case which definition served to identify the relevant population from which a sample was drawn. It also outlines how the data was collected and analysed.

4.4.1 Defining the case in respect of this research study

Much has been made in the literature of defining precisely what represents a 'case' and the rationale for selecting a particular case (Yin, 2003; Stake, 2003). For example, a case has been described as being represented by a person, a programme, an event, a community or an organisation. Prevalent features of a case include that it is a bounded system, is purposive, functions, and has the complexity of an integrated system (Stake, 2003; Cohen et al, 2000).

The case in this research study is defined as, and confined to, researching the experience of members of the academic community who are actively engaging in WBL curriculum development and delivery with industry. In this research study 'industry' includes engagement with private and public sector employers and professional bodies. An important consideration in respect of data collection is identification of the units of analysis in order to undertake a piece of research which allows for in-depth study rather than an excess of unmanageable data (Stark & Torrance, 2005). Equally the study needs to avoid being so small that there is a temptation for the researcher to make large assertions with very little evidence (Stake, 1995). I needed to identify participants who would generate data relevant to the case. Hence it was very important that I had clearly defined the case as this would assist in identifying the population from which a sample would be drawn.

4.4.2 Setting parameters

Prior to identifying the population I set a number of parameters in respect of the nature of the WBL programmes of which I would require potential participants to have knowledge of and experience in. These guiding parameters, which are set out below, also provide the reader with some explanatory notes in respect of terminology utilised within this research study.

Programmes, parameters and terminology

The WBL programmes which participants in this research study needed to have experience of are those which were initiated by and developed in conjunction with an employer or an employer representative group or body closely affiliated to the employer. The aim of the WBL programme is to meet the learning needs of the workplace where the students are based.

While the model of employer engagement may vary what is common among the WBL programmes is:

- programmes are developed for students who are employed in the private/public sector, that is, working for a company, or a company within a sectoral group of companies, or for a company closely affiliated to a professional body, or for a company which is a client of a private company;
- Programmes are initiated as a result of a direct request by industry;
- Curriculum development and delivery directly involve employers/professional body representatives and this involvement is continuous for the lifetime of the programme;
- Programmes are all part time;

- The levels of programmes vary from Level 6-9 on the National Framework of Qualifications (that is Higher Certificate to Masters). The Institute also has a minor award system which encompasses Continuing Professional Development Certificates, Diplomas and Postgraduate Diplomas. In the case of programmes in engineering short programmes for industry may attract a Certificate of Attendance and/or recognition by the industry itself through an industry recognition system;

- The term 'industry' encompasses the Institute's engagement with private and public sector employers and professional bodies.

The relevance of the above parameters to the case and the research questions

The above parameters were selected for a number of reasons. Firstly, they were influenced by issues highlighted during the course of undertaking the literature review. On reflecting on the literature I began to speculate whether WBL curriculum development and delivery, and concerns which the academy may have around it, are less about the quality of knowledge resulting from WBL initiatives and are more about the disturbance of academic protocols for curriculum development and delivery (Hager, 2000). In addition, the work of researchers (Boud and Symes, 2000; Kinman and Kinman, 2000) suggesting that when members of the academy have a face-to-face professional interaction with employer representatives on WBL initiatives that they feel their professional identity is threatened, made me interested in asking experienced WBL academic practitioners how they experience and perceive their interaction with industry on WBL curriculum development and delivery. Another dimension to HEI's engagement in WBL with employers outlined by Casey (2003), around the commodification of knowledge and whether WBL activities may exclude the needs of the learner, made me reflect whether when engaging with industry the academy may feel under pressure to compromise on aspects of curriculum development and delivery.

Secondly, my professional experience in the area of WBL with industry has involved a direct relationship with industry representatives and within these direct relationships, as outlined in Chapter 1, the Introduction, is where my motivation to undertake this research study arose. So hence I wanted to explore the experiences of academic practitioners who have intimate relationships with industry on WBL curriculum development and delivery. Finally, within the Institute WBL initiatives with industry are, as far as I have been able to ascertain, associated with students undertaking a programme on a part-time basis, so the students are part-time with delivery of programmes taking place on-campus, in-company or a mix of on-campus and in-company delivery.

4.4.3 The case and the population

The case in this research study is defined as relating to the experience of members of the academic community when they engage in WBL curricula development and delivery with industry. As outlined in the guiding parameters above, the WBL programmes relevant to this research study are those which are initiated by industry, that is, industry approaches the Institute expressing an interest in developing a programme for its employees, or in the case of a professional body for employees based in a member company, and is involved on an ongoing basis with the programme. So participants in this research study needed to be actively engaging in WBL curriculum development and delivery with industry as it is their experience of this activity which defines and bounds the case. In the case of functional participants these were selected as a result of academic participants in the

research study raising issues connected to their experience of WBL curriculum development and delivery with industry and which were pertinent to the role of a functional leader. The identification of the population from which the sample was drawn is outlined below.

Identification of the WBL Leaders Participants

In my previous role in the Institute I was a facilitator between industry clients and academic colleagues in respect of promoting WBL initiatives with industry. Hence I already had worked with a number of senior academic colleagues on WBL initiatives. However, in order to ensure that key academics engaged in the activity were included in the research study, the Institute's Academic Quality Assurance Minutes (which record matters in respect of new programmes) for the period 2002-2007 inclusive were researched. Researching these minutes served to confirm the identity of key academic colleagues involved in WBL with industry. I designated these four participants as 'WBL Leaders' as they have an official leadership role as a Head of School or Department and are also key initiators of WBL interaction with industry.

Identification of the WBL Academic Practitioners Participants

Additional academic interviewees were identified during the course of the research by snowball sampling. Snowball sampling is a technique used by researchers where the researcher identifies a number of key individuals and then uses these key individual as informants to identify other relevant participants (Cohen, Manion, and Morrison, 2000). The WBL Leaders were asked to identify key WBL academic colleagues in their School or

Department they work with on WBL curriculum development and delivery with industry. A total of twelve WBL Academic Practitioners were identified. Eight of the WBL Academic Practitioners have lecturing roles, two are Heads of Departments, one is an Assistant Head of a Department and one has a pedagogical role supporting a number of specific Schools within the Institute.

Identification of the Functional Leader Participants

As data collection proceeded and as participants raised issues I included an additional four functional participants, that is, participants with institutional/strategic, financial, human resources and quality assurance roles.

Tables 4.1 and 4.2 provide a summary of participants.

Table 4.1

Participants
WBL Leaders and Academic Practitioners

Discipline	**WBL Leaders** Roles: Head of School (3) and Head of Department (1)	**WBL Academic Practitioners** Roles: lecturing (8), Head of Department (2), Assistant Head of Department (1), pedagogical role (1)
Business	1	4
Built Environment	1	2
Engineering	1	4
Science	1	2
Totals	4	12

Table 4.2

Participants
Functional Leaders

Functional Leaders	**Participants**
Head of Institute	1
Head of Finance	1
Head of Human Resources	1
Head of Quality Assurance (academic)	1
Total	4

4.4.4 Data collection

While six methods of collecting data in respect of case study research have been identified, that is, documentation, archival records, interviews, direct observation, participant-observation and physical artefacts (Yin 2003) this research study used interviews as its instrumentation tool.

Using interviews as a data collection instruments requires the researcher to understand the strengths and weaknesses associated with this research instrument:

Strengths

- Targeted – focuses directly on case study topic
- Insightful – provides perceived casual interferences.

Weaknesses

- Bias due to poorly constructed questions
- Response bias
- Inaccuracies due to poor recall
- Reflexivity – interviewee gives what interviewer wants to hear.

(Yin, 2003, p.86)

This research study used semi-structured interviews which facilitates clarification, elaboration and probing (May, 2001) and allows the researcher to follow, in an informal way, a specific line of inquiry (Yin, 2003). Semi-structured interviews also allow participants some flexibility around discussing aspects of the research study important to them.

Contacting potential participants

As I work in the same HEI as potential participants, and had either worked or met some of them, initially I planned to phone potential participants and

invite them to participate in the research study. However, on reflection I decided against this approach as I felt it might be embarrassing for a potential participant if they wished to decline. Instead I sent an initial email (Appendix I) from my personal email account to potential participants which briefly outlined the nature of the research and informed them that if they were willing to participate a confirmatory email (Appendix II) accompanied by a Participant Consent Form (Appendix III) and a Participant Information Sheet (Appendix IV/V) would be forwarded to them in advance of the interview. Only two potential participants did not participate in the study. Unknown to me one potential participant had retired. A second potential participant indicated they were willing to participate but subsequently it proved difficult to set up an interview with this potential participant. It is likely that this potential participant was unable to participate due to other demands on their time.

Preparing for and conducting the interviews

Researchers are advised to have an organised and focussed approach to data collection and develop a data gathering plan which includes:

- Definition of case
- List of research questions
- Identification of helpers
- Data sources
- Allocation of time
- Expenses
- Intended reporting

(Stake, 1995, p. 51)

It is also important researchers begin with a 'wide' or 'open' phase without 'selectivity or prejudgement' and progressively identify key foci (Cohen et al. 2000, p.189).

In this research study, initially a lengthy questionnaire was drafted. However, on reviewing this questionnaire it was deemed to be too long and also too constraining as it might inhibit or preclude participants raising issues which reflected their experience around WBL with industry. However, as a novice researcher I was concerned that without a questionnaire to guide the interviews participants might not engage during the interview and also if interviews were too open data analysis would be difficult.

After discussing the issue with my supervisor the approach taken involved (i) forwarding in advance of the interview the Participant Profile sheet to be completed by participants which requested biographical information (Appendix VI) and (ii) In the case of academic participants I included with the Participant Information sheet an outline of the main areas which would be the focus of the interview and also some indicative areas the interview might cover (Appendix IV). It was hoped that by forwarding some indicative areas in advance to academic participants these would stimulate some reflection on the part of participants in advance of the interview (iii) I also developed an Interview Guide (Appendix VII) which included (a) practical and important reminders for me, for example, ensuring the Consent Form was signed and the Participant Profile Form completed/returned (b) incorporated the indicative areas for discussion which had been forwarded in advance to academic participants with their Participant Information Sheet (c) in respect of Functional Participants outlined possible questions/areas for discussion. The section of the Interview Guide in respect of Functional Participants was informed by issues raised by academic participants. Prior to conducting the

interviews I piloted the Interview Guide with an academic colleague (who was not a participant) and received valuable feedback and practical suggestions around how best to conduct the interviews.

The Interview Guide was brought with me to the interviews. However, as participants proved very engaged and enthusiastic about talking about their experience of WBL I found that once the interviews began the discussion flowed freely. Occasionally during or towards the end of the interview I scanned the Researcher Guide to check if any key area had not been discussed.

In advance of interviews, participants were sent (i) the Participant Information Sheet (ii) the Participant Profile Sheet and (iii) the Participant Consent Form. The Participant Information Sheet informed participants about the research study and also that the interview would be taped with a transcript supplied to participants for amendment, and data would be anonymized. Participants were informed in advance that interviews would take about 45-60 minutes. The majority of interviews lasted about 1 hour and 15 minutes, with the shortest taking approximately 45 minutes and the longest approximately 1 hour and 45 minutes. At the beginning of each interview, I again outlined the nature of the research, the format of the interview and administrative arrangements for the forwarding of transcripts to participants. Few participants completed their Participant Profile Sheets in advance of the interviews and generally these were completed at the beginning of the interview. I maintained a file for each participant containing (i) email

correspondence (ii) completed Participant Profile Sheet (iii) signed Participant Consent Form (one copy was retained by the participant). During the course of the data collection period, June 2009-February 2010, I also maintained an Interview Schedule recording dates of interviews and dates when transcripts were sent to participants.

Post the interviews

Approximately two weeks after each interview participants were sent a transcript of the interview and asked to forward any amendments to me by a certain date (generally about two weeks). Participants were sent reminder emails and/or follow up phone calls were made regarding the deadline for forwarding any amendments. Only three participants forwarded a few minor amendments in respect of their transcripts. Early on during data collection, I found that due to feedback from participants that when I forwarded transcripts I had to explain to them that they did not have to amend them in order to enhance sentence construction. So I put in a sentence in the email accompanying the transcript to explain to participants that as the transcripts record real conversations and as such will include incomplete sentences, slang as these are features of normal, everyday conversations, there was no need to amend the transcript for this reason.

4.4.5 Data analysis

In case study research a degree of conscious or unconscious analysis is taking place during the research process via interpretation on the part of the researcher (Stake, 1995). Also, while the *a priori* development of categories and coding schemes supports the development of a systematic approach to

data collection and subsequent analysis, the nature of case study research is such that new themes or issues may emerge which do not fit with the system of categorisation which has been developed. Analysis continues throughout the research process and it is unrealistic to simply assign a particular period in the research process to analysis (Stake, 1995). Aside from physically undertaking the interviews I also transcribed each of the interviews. So without realising it I had informally and unconsciously begun data analysis.

In analysing the data a number of challenges had to be confronted. Firstly, an objective of this study is to give 'voice' to and reflect the personal and local experiences of participants active in the field of WBL. According to Miles & Huberman (1994, p.56) analysis "is meaningful dissection while keeping the relationships between the parts intact". In undertaking the analysis there was a danger that participants' accounts of their experiences of curriculum development and delivery would become interesting descriptions of their experiences rather than an interpretative analysis of the findings.

Secondly, like many qualitative researchers I confronted the daunting task of having completed twenty interviews of making decisions around how to analyse the volume of data. The shortest transcript contains 5,662 words; the largest transcript has 14,223 words, with the average length of transcripts at 9,670 words. Aside from analysing the transcripts I also had to take into account the informal, and perhaps unconsciously collected observations and impressions around the data. These observations and impressions were gleaned not just from the face-to-face interview but also from listening to the

voices of the participants again during transcription of the taped interviews. Subtle changes in the tone of voice of a participant, which had not always been noticed by me during the interview, could be heard on the tape causing me to stop transcribing and to reflect. There is both comfort and disquiet for the novice researcher that there is neither a standard method or best method for analysis of interviews (Kvale, 2007; Janesick, 2003).

Initially the data was coded using pre-determined categories which followed the path of the development of a programme with an employer, that is, beginning with how engagement with an employer is initiated, the stages and issues which are generally associated with curriculum development and delivery of the curriculum, for example, issues arising during curriculum development, recruitment of students, pedagogical issues, and assessment. The data contained in the Participant Profile Sheets was placed in Tables. This approach was partially influenced by Hager (2000) suggesting that WBL disturbs and interferes with academic processes for knowledge production and transmission. It was also influenced by other concepts raised in the contextual and literature reviews as well as my experience of working in the area. While the usage of pre-determined categories aided initial coding of the data it reflected what has been described as first level coding (Miles and Huberman, 1994) and did not serve to identify themes which would locate the findings within a broader context. There was a danger the findings would become a descriptive presentation of discrete concepts or issues rather than an integrated and interpretative account of the findings. It was easy to become excited and distracted by an interesting issue contained in the data and then

fail to see whether it was connected to or had any relevance for other aspects of the study. However, first level coding of the data served to highlight issues which were important to participants and began to highlight patterns among participants' responses. After the data was coded a summary of some of the main concepts arising from each of the category codes was produced. While again this supported identifying issues that were interesting and/or important to participants it still kept the findings as a linear, descriptive and local account of WBL curriculum development and delivery.

Analysis of the data involved considerable movement for me between the original transcripts, the individual participant coded data, the merged categories (all of the individual participants' responses in respect of each individual categories were merged by placing them in a hard copy portfolio) and the summary document. During the course of the analysis these documents were marked with scribbled notes, underlinings, and question/exclamation marks. Initially data analysis was sequential and too descriptive as it followed participants' descriptions around their experience of WBL curriculum development and delivery. It took time to move from first level coding of the data to the development of a thematic and interpretative account of the findings. I had to remain alert to the nuances and implication of what a participant on the surface was saying about one issue which connected to, or had implications for, other issues in the research study. This involved reflecting back on issues raised in the Contextual and Literature Reviews as well as constantly reminding myself of the research questions in order to try and avoid being seduced by an interesting, but in the context of

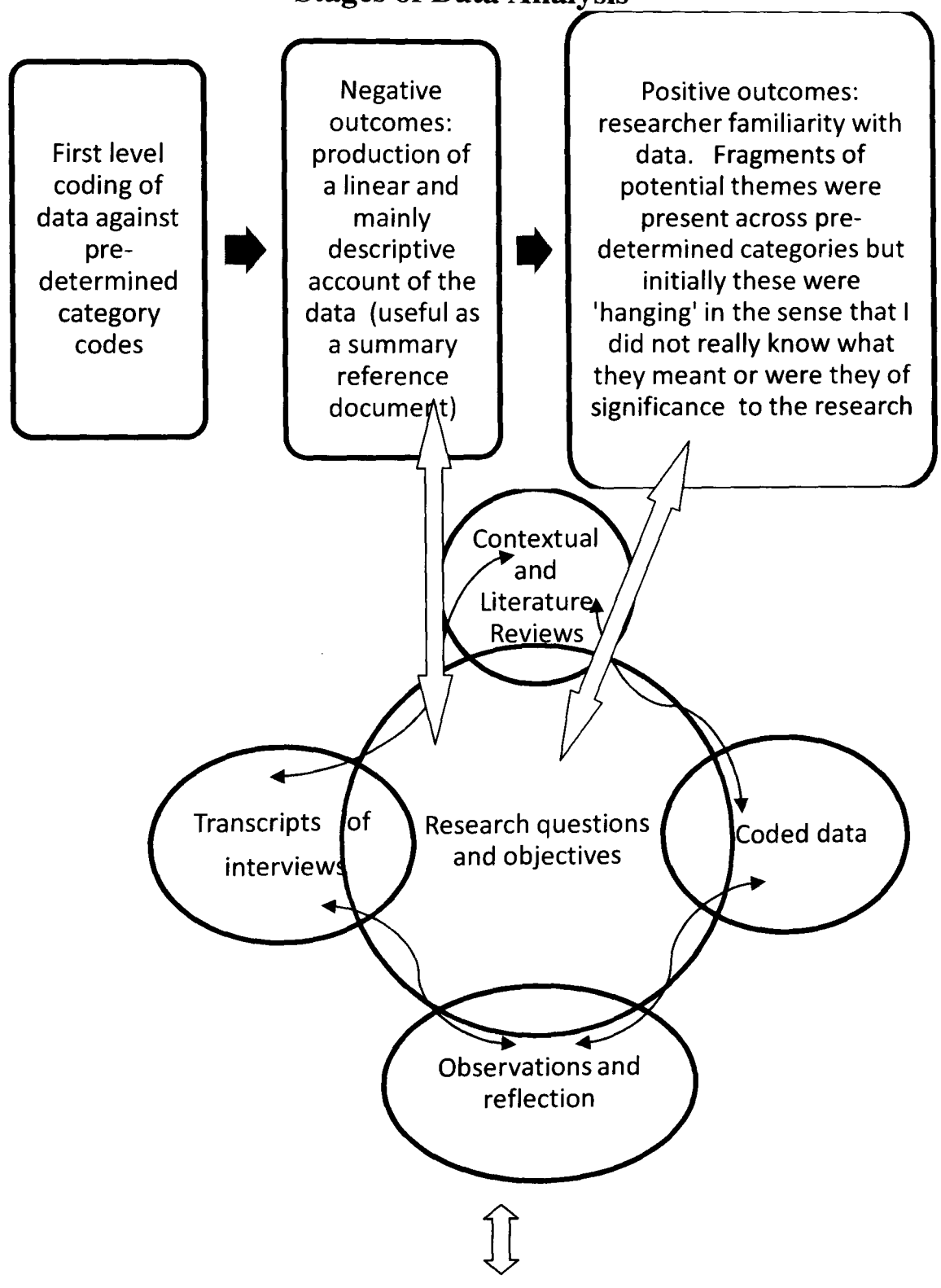
the research questions, irrelevant piece of data. I think in hindsight I had expected that themes would be contained within the pre-determined categories rather than fragments of themes being present across categories.

During data analysis I felt like a first time choreographer (Janesick 2003) trying to include all of the data, trying to find relevance for all of the data, waiting for the key themes to spontaneously emerge, and the findings to emerge in a form suitable for presentation to an audience. Like the choreographer, I tried to remain open during data analysis while hoping that in the end some meaningful form or structure would emerge. Needing to be both open and controlled during data analysis became part of the excitement and frustration of analysis. As the researcher-choreographer I often felt I would never resolve where, if anywhere, the data was leading. Data analysis often felt like choreography of many different and unrelated moves with the possibility of developing a final structure, in the form of a coherent analysis, remaining elusive for some time. (Janesick 2003).

Table 4.3 provides a diagrammatic representation of the stages of data analysis.

Figure 4.3

Stages of Data Analysis



Focus on research questions keeping in view conceptual framework and issues arising from Contextual and Literature Reviews and constantly asking questions of the data such as is there anything new or unexpected emerging from the data, what does any similarity or difference in responses among participants mean. Gradual emergence of key themes

4.4.6 Validity, reliability, and generalisabity

It is important from the outset of the research study that I consider whether the audiences for the research would believe and trust its findings. Questions surrounding the validity, reliability and generalisability of the findings might arise. Validity relates to the 'truth status' of the research study, and reliability to whether if the same study was carried out again would it generate the same results (Robson, 2002). The importance of establishing validity and reliability in both quantitative and qualitative research is contested (Cohen et al, 2000). Case study researchers who tend to utilise quantitative data, such as Yin, place greater importance on establishing reliability and validity while those tending towards qualitative data collection, such as Stake, give these concepts little attention (Bryman, 2004). Aside from concerns surrounding the validity and reliability of case study research whether case study research generates results which are applicable outside of the particular case study also needs to be considered (Robson, 2002).

Weaknesses of case study research have been enumerated as:

1. The results may not be generalizable except where other readers/researchers see their application.

2. They are not easily open to cross-checking; hence they may be biased, personal and subjective.

3. They are prone to problems of observer bias, despite attempts to address reflexibility. (Nisbet & Watts 1984 quoted in Cohen et al 2000, p184)

Some researchers argue that while case study research may not provide statistical evidence applicable to the general population that generalization of findings can occur when:

> readers recognize aspects of their own experience in the case and intuitively generalize from the case, rather than the sample (of one) being statistically representative of the population as a whole. We find this argument convincing but others may not.
> (Stark & Torrance, 2005, p. 34)

It is also important to "appreciate that case study researchers do not delude themselves that it is possible to identify typical cases that can be used to represent a certain class of objects "(Bryman, 2004, p.51).

To address issues around potential weaknesses or criticism in this study I make the following points. Firstly, the development of the research framework was undertaken and informed by the literature and developed under the guidance of my supervisor as well as three critical academic colleagues who provided constructive criticism at key stages in the research study.

Secondly, the research questions associated with this case study are asking for an account of the experiences and or opinions of participants on WBL with industry. I expect that audiences for this research may have different experiences and or have different perceptions of their experiences. This research study presents findings which turn will be critiqued by audiences for it with the aim that it will continue to inform debate and discussions around policy and practice in the area. To do this I developed a research framework which used case study research which it is argued is appropriate for the research problem.

Thirdly, the advantages of case study research are it allows for the collection of real life data, can cope with complex research sites, and facilitates flexibility in respect of data collection. These advantages can also pose problems in respect of both control and analysis (Cohen et al, 2000). While the possibility of having rich descriptions and flexibility in research design are advantages of case study they have to be approached with caution as there is a danger that enthusiasm to include a lot of data may compromise the depth of data collection (Stark & Torrance, 2005). As discussed earlier I spent a considerable amount of time undertaking data analysis. Audiences for the research study may not agree with its findings but it is hoped they find them believable and trustworthy.

Fourthly, while it may be argued that the data collected is biased due to my subjective and interpreted account of the subjective and interpreted views held by the researched, the legitimacy of interpretative data has been defended as long as it is undertaken using an "audit trail by which other researchers validate or challenge the research findings or construct alternative arguments" (Bassey, 1999, p. 65). Participants were informed of the purpose of the research study. Participants and audiences for this research will be aware that I have worked in the area being researched. Participants were provided with a transcript of their interview with an opportunity to amend it. I maintained insofar as is practical files in respect of participant involvement, transcripts, and documents developed during data analysis. Having a systematic approach to case study research is an important mechanism to keep the research focussed and to avoid the criticism that case study research lacks

rigour and is often unsystematic producing "massive, unreadable documents"(Yin, 2003, p. 11).

Fifthly, this research will be available to audiences both within and external to the Institute. Educational research has been criticised for being situated in the local thereby militating against theory development and general application (Berliner, 2002). As observed earlier, educational research has also been criticised for its failure to impact on policy and practice (Kitwood, 1976; Gough, 2004). In this instance case study research provides a means to undertake a piece of research which has been contextualised in the local facilitating reader recognition of policy and practice in their institution.

Case study research follows an interpretative tradition of research. Undertaking research by examining issues through the eyes of the researched is challenging as the researcher has to be aware the data collected will be the result of interpretation on the part of the researched and the researcher (Stake, 1995; Cohen et al, 2000). Interpretation is a feature of all research and researchers need to be aware of not making dramatic 'assertions' based on a small quantity of data (Stake, 1995). It would be disingenuous to deny the presence of the researcher as this would be a denial of one of the realities of case study research. In this instance, as the researcher I am also classified as an insider researcher and this aspect of the research study, along with ethical considerations, is discussed in the next section.

4.5 Research ethics and insider research

Issues surrounding research ethics and insider researcher are discussed separately in the following two sub-sections. However, it is important to note there are ethical issues particular to conducting insider researcher. For coherence, these ethical issues are discussed sub-section 4.5.1 and this is then followed by a more general discussion surrounding ethical issues in sub-section 4.5.2.

4.5.1 Insider research

Like the participants in this research study I am employed by the Institute. At the outset of this research my role involved acting as a facilitator between Schools and Departments within the Institute and industry clients interested in developing a WBL programme. As outlined earlier in this research study, my motivation to undertake this research arose from my experience of working in the area and challenges which colleagues and I experienced in undertaking our roles. While I no longer work in the area of WBL with industry I am still interested in it and employed by the Institute. So hence my role is akin to:

> A practitioner-researcher is someone who holds down a job in some particular area and is, at the same time, involved in carrying out systematic enquiry which is of relevance to the job. (Robson, 2002, p.534)

The insider researcher has multiple roles and according to some has "too many hats (and coats)" (Holian, 1999, p.3). Along with the participants in this research study I am an employee of the Institute and have direct experience in the area which is the subject of the research. I have existing relationships with some of the participants and in my previous role in the

Institute had responsibility to promote interaction with industry. I also have a personal interest in the potential of collaborative relationships to facilitate access to higher education.

The disadvantages of being a practitioner-researcher conducting insider research have been enumerated as:

1. Lack of time due to employee role commitments;
2. Lack of expertise particularly when the researcher is inexperienced and does not know what they do not know;
3. Inexperience in carrying out research leading to lack of researcher confidence in their ability to carry out the research;
4. Having "preconceptions about issues and/or solutions";
5. Difficulties surrounding status and whether the researcher is perceived as 'high' or 'low' status which may impact on conducting the research as well as the reaction to the research findings, "the 'prophet in own country' phenomenon with greater credence being given to external expertise. (Robson, 2002, p. 535)

Added to the above disadvantages of insider research is the potential for conflict due to the multiple roles and responsibilities of the insider researcher. On the face of it having access to participants is an advantage but there is also the potential for a blurring of boundaries in respect of the role of the insider researcher and their role as an employee (Holian, 1999). A concern is that the insider researcher may almost be carrying out 'covert' research opportunistically gaining access to data whilst wearing their employee hat. I tried to address these issues by being open and honest in respect of my undertaking the research.

Lack of experience and expertise when conducting insider research carries risks for me. In conducting the research and presenting its findings the research may be judged on the basis of preconceptions surrounding not only my inexperience as a researcher but also the fact that I may be viewed as one of the 'new professionals' whose role within the academy is dedicated to developing external relationships and generating income for the Institute (Rhoades and Slaughter, 2006). I may therefore be perceived as having a commercial as against an academic perspective. I may lack credibility due to this, and also while I hold an academic grade I am deployed in a non-academic support service area.

Positivists may argue that the insider researcher's role is too integrated with the research study and therefore too biased to enable them to conduct objective research and hence validity is threatened or distorted (Rooney, 2005). Anti-positivists will reject not the possibility of bias but the argument that knowledge is detached and objective. Bias is a contested concept and the meaning of the term is ambiguous. It "is generally seen as a negative feature, as something that can and should be avoided". (Hammersley and Gomm, 1997, pp.1-2). While the term bias is often used in respect of its statistical implications for the occurrence of systematic error it is also used to:

> denote one particular source of systematic error: that deriving from a conscious or unconscious tendency on the part of a researcher to produce data, and/or to interpret them, in a way that inclines towards erroneous conclusions which are in line with his or her commitments. (Hammersley and Gomm, 1997, p.1)

Uncovering and declaring personal biases and accepting the risks attached to undertaking insider research allow us to avail of some of its advantages and these are discussed next.

Undertaking insider research had advantages and conveniences attached to it in that as a consequence of their employment in the organisation, the researcher has resources, such as knowledge and experience, which may support and ease the development of the research project (Robson, 2002; Le Gallais, 2008). I found this to be true. It was relatively easy to gain access to potential participants. While initially I contacted potential participants using my personal email account and corresponded with potential participants as a research student undertaking a doctorate with the University of Sheffield there is no doubt that participants contacted in the early stages of data collection knew me as an employee of the Institute. Although I did not know many of the WBL Academic Practitioners who participated in this research study, the fact that WBL Leaders allowed their name to be referenced by way of introduction encouraged their participation.

Some argue that practitioner research is simply a means for practitioners to carry out research for professional development and/or to acquire a degree in the process, or at best the research impacts only on the organisation where the research took place "rather than the production of findings for widespread use" (Gomm, 2004, p.292). Impacting only on one's professional sphere or organisation might be considered to be a limited outcome. A counter argument is that practitioner research may address some of the criticism

levelled more generally against educational research that it "contains too much work that is inadequate in terms of research quality, practical relevance, or is inaccessible to those who might apply such research evidence" (Gough, 2004, p.65). The insider practitioner-researcher may be better positioned to cope with the complexities of the contextual, ubiquity of interactions, and the short-life of research findings involved in carrying out educational research (Berliner 2002) and continue to be involved with the research findings long after the final research report has been filed.

4.5.2 Ethical issues

Through course work and tutorials in Part 1 of the doctorate of education with the University of Sheffield I became familiar with issues surrounding research ethics generally and also the specific ethical regulations and requirements of the University of Sheffield. I also became conscious that while there are guidelines for the conduct of ethical research, such as those provided by the British Education Research Association (BERA, 2004), that:

> 'Research ethics' refers to rules of morally good conduct for researchers. Just as research cannot tell us what is the good life, research itself cannot tell us what is morally good research. Thus research ethics are grounded in moral and political beliefs which are external to research itself. (Gomm 2004, p.298)

Like many researchers, I looked for a list of 'guidelines' to direct the research. BERA (2004) indicates:

> all educational research should be conducted with an ethic of respect for:
>
> - The person
> - Knowledge
> - Democratic Values
> - The quality of educational research
> - Academic freedom.
>
> (BERA, 2004, p.5)

Inter-twinned with the undertaking of a research project are adherence to ethical guidelines such as those provided by BERA (2004) but also, as alluded to by Gomm (2004), what I would describe as personal and subjective aspects to doing good ethical research.

Ethical standards and the research study

As the researcher I sought to undertake a piece of research which will make an original contribution to the development of knowledge. As was discussed earlier, I undertook to follow good ethical research standards and looked to bodies such as BERA (2004), my supervising university, and the literature to provide me with standards to guide my research. What is less clear is how to address matters which may require a judgement call as to what is right or wrong in respect of issues which may conflict with our desire to make a contribution to knowledge, but also have some adverse implications for participants in or sponsors of our research. It has been observed:

> there is rarely a clear-cut, and context-free, set of rules or principles which can be applied without deliberation and judgement. Moral thinking is a kind of practical thinking, and thus the educational researcher faces the same kind of moral demands as does the teacher as he or she applies professional judgement in the 'educational' practice. There is a constant need to reflect on the values which inform the research and the ways in which those values might be made concrete in the research activity itself. (Pring, 2004, p.142)

As researchers we undertake to produce truthful and transparent research and while we may disagree as "to what the 'truth' is and how to get it, but they (i.e. researchers) are all subject to a moral requirement to do research truthfully" (Gomm, 2004, p.299). Potentially we all face the ethical dilemma of the search for knowledge conducted truthfully and transparently versus our ethical responsibilities to our participants and sponsors. A decision to sacrifice the needs of our participants on the basis of our commitment to a search for knowledge and truth involves making a judgement call and whether we can argue that the importance of the research outweighs the needs of the participants (Pring, 2004). As researchers we learn there will be instances of ethical dilemmas which "have to be dealt with in an ad hoc, best-of-the-worst kind of way" (Gomm 2004, p.303). Thus good ethical practice will become a function of the interplay between the guidance and advice we obtain and our personal judgement and values in respect of how we define ethical research.

In conducting ethical research, researchers need to consider their responsibilities towards participants, sponsors of the research study, and to the community of educational researchers (BERA, 2004).

Responsibilities to participants

In respect of conducting the research key issues to ensure ethical standards towards participants involves considering:

1. Informed consent
2. Harm to participants
3. Invasion of privacy
4. Deception
   (Bryman, 2004, pp.509-514)

The participants in this research study and I are employees of the Institute. As recommended by Cresswell (1998) prior to conducting face-to-face interviews all participants were sent a Participant Information Sheet. This Sheet outlined the nature of the research study, how the interviews were to be conducted, including arrangements in respect of the recording of the interviews, and the supplying to each participant of a transcript of the interview, and a period during which they were free to amend it. Before recording of the interview began, I again outlined the purpose of the research and arrangements in respect of the provision of a transcript. Again prior to the commencement of the interview, I also informed participants that data would be anonymized and participants would be identified by their discipline, and also any company names which may have been referred to by a participant during interviews would be omitted. Participants were also provided with a Participant Consent Form which specified that they were free to withdraw from the research study at any time. Avoiding causing harm to participants is an important consideration as this is an issue which can relate to a participant's self-esteem or development (Bryman, 2004) and is connected to preserving, when required by the participant, confidentiality. Transparency in respect of the purpose of the research and what use will be

made of any findings resulting from it are critical in order to avoid participants feeling that they have been mislead in respect of their role in the research project.

Responsibilities to sponsors of research

While I do not have a sponsor who is paying for a commissioned research project, the Institute provided fee support in respect of my participation in the doctorate in education. BERA (2004) guidelines specify that a sponsor is not just an institution which funds research but also one which "facilitates it by allowing and enabling access to data and participants". Providing to participants in advance of each interview a Participant Information Sheet and the Consent Form, as well as ensuring that prior to the commencement of recording participants were again reminded of the purpose of the study and matters in respect of data handling, were important to me to ensure participants understood the purpose of the research and the nature of their involvement in it.

Responsibilities to the community of educational researchers

In the case of undertaking this doctoral thesis, I obtained advance ethical approval from the University of Sheffield which is supervising the research study. Obtaining ethical approval in advance of conducting the research, not only ensured that ethical considerations were considered at the outset, but also provided useful feedback in respect of ethical issues surrounding the research. The feedback I received from the University of Sheffield suggested that as I was likely to collect biographical data in respect of

participants I would need to consider issues surrounding data protection, privacy and confidentiality. Not only was this useful from an ethical perspective, but it also served to focus me on what, if any, biographical data I intended collecting beyond basic participant profile data. As a result of this feedback I collected additional participant profile data and also data in respect of participants' career history and motivation to engage in WBL with industry. On analysis this data was of significance to the research study.

PART II

Chapter 5
Findings and Analysis in respect of WBL Leaders' and Academic Practitioners' biography, motivation, and initiation of engagement with industry

. . . and this is one of the unseen benefits of this type of activity, academic staff can be very closeted, they can have a very narrow view of their world, defined by their areas of expertise, and it really benefits them hugely and it benefits their students hugely for them to be exposed to this type of activity.
(WBL Leader, Business)

5.1 Introduction to the findings and analysis

For the convenience of the reader section 5.1.1 below provides a summary table of the participants and outlines matters relevant to data analysis and the presentation of the findings and analysis. Chapter 5 presents the findings and analysis in respect of:

- the biography of WBL Leaders and Academic Practitioners;
- the reasons WBL Leaders and Academic Practitioners gave as to why they engage with industry on WBL curriculum development and delivery;
- how engagement with industry clients is initiated.

Chapter 5 is followed by Chapter 6 which presents and analyses the findings in respect of the experience of WBL Academic Leaders and Academic Practitioners when they engage with industry on WBL curriculum development and delivery.

The Presentation of the Findings and Analysis (Chapters 5 and 6), is followed by Chapter 7, the Discussion and Chapter 8, the Conclusions.

5.1.1 The participants in the research study

Table 5.1 below provides a summary of participants and their disciplines/functional areas.

Table 5.1

Participants in the Research Study
Summary Table

Discipline	**WBL Leaders Roles: Head of School (3), Head of Department (1)**	**WBL Academic Practitioner Roles: lecturing (8), Head of Department (2), Assistant Head of Department (1), pedagogical role (1)**
Business	1	4
Built Environment	1	2
Engineering	1	4
Science	1	2
Functional Leaders		
Head of Institute	1	
Head of Finance	1	
Head of Human Resources	1	
Head of Quality Assurance	1	
Total Number of Participants = 20		

The research site where participants are located is referenced in this thesis as the 'Institute'

The HEI research site is referred to as the 'Institute'. In instances where a participant is being directly quoted, and has referred to the name of the HEI, this has been substituted in their quote by the use of the word 'Institute'.

Participants referenced by their discipline or functional area

With the exception of Functional Leaders, participants are referred to by their discipline, that is, Business, Built Environment, Engineering or Science. For example, WBL Leader (Business) or WBL Academic Practitioner (Science). Functional Leaders are referred to as 'Head' and their functional area, for example, Head of the Institute or Head of Human Resources. For reasons of confidentiality, references to specific professional bodies and industry clients are omitted. Again in order to preserve anonymity, in a small number of instances there is no reference to a participant's discipline.

While this study explores WBL with industry from the perspective of academics who are active in the field, the findings and analysis chapters includes the findings and analysis in respect of the four functional participants. These interviews were undertaken in response to issues outlined by WBL Leaders and Academic Practitioners during the course of their interviews.

5.2 The biography of WBL Leaders and Academic Practitioners

The biographical data in respect of the four WBL Leaders and twelve Academic Practitioners is presented in the two tables below. For the convenience of the reader, a summary of the biographical data is given below each of the tables:

Table 5.2

WBL Leaders – Biographical Data

Discipline	Gender	Age Range	Highest Qualifica-tion	Length of service in the Institute	Industry Experience	Other HEI Experience	Member of professional Body/ies
Business	Male	46-50	Masters	16 yrs	Yes	Yes	Yes
Built Environment	Male	51-55	Prof Qual	26 yrs	Yes	No	Yes
Engineering	Male	56-60	Masters	26 yrs	Yes	No	Yes
Science	Male	41-45	Doctorate	22 yrs	No	No	Yes

<u>WBL Leaders – Summary of biographical data</u>

The data in respect of the WBL Leaders indicates:

- All WBL Leaders are male;
- Three WBL Leaders are Heads of School and one is a Head of Department;
- Age range is from 41-60 with 3 participants over 45 years of age;
- Participants highest level of qualification is masters/professional qualification with one participant possessing a doctorate;
- Average length of service in the Institute is 22.5 years;
- Three participants acquired private sector industry experience relevant to their field/qualifications;
- All participants are members of professional bodies as appropriate to their discipline.

Table 5.3

WBL Academic Practitioners – Biographical Data

Discipline	Gender	Age Range	Highest Qualification	Length of Service in the Institute	Industry Experience	Other HEI Experience	Member of professional Body/ies
Business	Male	61-65	Masters	35 yrs	Yes	No	No
Business	Female	51-55	Doctorate	8 yrs	Yes	No	Yes
Business	Male	46-50	Masters	9 yrs	Yes	No	Yes
Business	Male	56-60	Prof. qual	25 yrs	Yes	No	Yes
Built Environment	Male	51-55	Masters	24 yrs	Yes	No	Yes
Built Environment	Male	51-55	Masters	24 yrs	Yes	Yes	Yes
Engineering	Male	41-45	Masters	19 yrs	Yes	No	Yes
Engineering	Male	46-50	Hons. Primary Degree	25 yrs	No	No	Yes
Engineering	Male	46-50	Prof. Qual	13 yrs	Yes	No	Yes
Engineering	Male	36-40	Doctorate	10 yrs	No	No	No
Science	Female	41-45	Doctorate	12 years	Yes	No	Yes
Science	Male	41-45	Doctorate	14 years	Yes	Yes	Yes

WBL Academic Practitioners - summary of biographical data

The data in respect of the WBL Academic Practitioners indicates:

- There are ten male and two female WBL Academic Practitioners;
- Eight of the twelve WBL Academic Practitioners have lecturing roles, two are Heads of Departments, one is an Assistant Head of a Department and one has a pedagogical/ quality assurance role;
- With the exception of one, WBL Practitioners are over 40 years of age;
- Four WBL Academic Practitioners have doctorates, five have masters and three possess a professional qualification/primary degree;
- Average length of service in the Institute 18 years;
- Ten of the twelve WBL Academic Practitioners have worked in the private sector in industry;
- Ten out of twelve WBL Academic Practitioners are members of professional bodies as appropriate to their discipline.

5.2.1 Pre-dominance of male, mature and experienced academics

What is striking in the data is it comprises of a group of predominantly male mature participants with considerable length of service in the Institute. The selection of the WBL Academic Leaders was informed by (i) my previous role within the Institute when I was responsible for promoting engagement between the Institute and industry in the area of education and training (ii) by researching the Institute's Academic Quality Assurance Minutes to identify key programme proposers, the WBL Leaders. During the course of interviewing, WBL Leaders were asked to identify key colleagues in their area with whom they generally work with on WBL initiatives with industry. The scope of this study does not allow for further exploration of the male dominance of the group of participants and any reasons given here to explain it can only be tentative and speculative. All of the senior participants who took part in this research study who hold either academic or functional posts of responsibility are male, that is, the four functional leaders, three heads of school, three heads of departments, and one assistant head of department.

Hence I would tentatively suggest that the male dominance among participants in this research study reflects the findings of research carried out by the Department of Education & Science. This research undertaken by the Department found that while the percentage of women employed in HEIs has increased women are still poorly represented at higher academic grades. (Department of Education and Science, 2007).

5.2.2 Influence of early career experience and/or local School/Department

From my experience of conducting the face-to-face interviews with participants, transcribing the interview tapes, and subsequently analysing the data, participants presented as a group of academics who were keen to highlight and stress that not only have they worked in industry but their early career experience continues to be an important influence on their role as academics. Participants maintain their relationship with industry through membership of professional bodies and involvement on WBL programmes with industry. Only one participant from Science has taken a sabbatical in order to acquire additional and specific industry experience. A WBL Leader acknowledged the importance of the influence of early career professional practice which he maintains encourages many members of his profession to continue their association with it:

> I suppose when I started out in life I worked in professional X (names of sector) consultancy, you develop interest in that profession . . . the profession . . . you know the clients, the industry, the professional service, so you just develop that interest. It stays with you all your life and becomes part and parcel of what you are. Most professionals are formed in that way and become engaged with the profession and by engaged with the profession, a lot of them will certainly stay with it. (WBL Leader, Built Environment)

Generally participants outlined how their early industry experience continues to inform their understanding of and interest in their profession or sector:

> Working with companies . . . I suppose one of the reasons, or why I may have an interest, is that I worked in X sector myself for a number of years basically for myself, self employed, and I worked in the X sector for probably about six, seven or may be seven or eight years so I would be familiar with the sector and I would be familiar with it from a business point of view. And one of the other reasons is that I always feel that, you know, as academics, and I didn't start out as an academic, I kind of came to that later in life, as an academic a lot of the people in X we teach or lecture in the X tend not to have experience, they may have come straight from academia and come into the School of X and I find that X is a very dynamic area, I also find that the theory and the academic side surrounding X is very, well as we teach it I think it is quite theoretical and should be more practical . . . .(WBL Academic Practitioner, Business)

As well as remaining connected with their sector or profession and industry generally for participants it is important to them that they are able to connect with the roles and responsibilities of their students who are employed in industry:

> I can connect with their worries and their backgrounds. I frequently get people saying you must have been in our place . . . I think that has helped me and made it a lot easier for me. (WBL Academic Practitioner, Business)

Two participants have followed an academic career path with all of their experience acquired in the Institute. Both of these participants indicated a strong interest in part-time higher education with one of these participants having expertise in pedagogy. So while not having worked in industry these two participants also presented as supportive of WBL curriculum development and delivery with industry. Participant involvement in WBL is perhaps a function of both early career experience and/or subsequent

membership of a Department/Institute which promotes and/or facilitates their involvement in the activity:

> The Department had been in contact with the industry long before X (participant's name omitted) came around so this is not something that X (participant's name omitted) alone did I simply carried on the tradition a bit. (WBL Leader, Engineering).

The majority of participants are not involved in research. It must be said that the broader question of how within HEIs academics make choices surrounding their academic career paths was not an objective of this study. However, as will be outlined later in the Findings and Analysis issues around academic recruitment, development and recognition were raised by participants so it is important to outline these participants' career paths.

Succession planning for development of WBL

From analysis of the data it is reasonable to conclude participants are based in Departments/Schools where they are encouraged and facilitated to continue their connection with industry. Despite not having worked in industry for some time participants' enthusiasm to collaborate closely with industry is strong. Functional Leaders reference the various ways in which the Institute supports academic development, for example, funding of postgraduate programmes, supporting attendance at conferences, and the provision of developmental programmes under the auspices of its Human Resources and Learning & Teaching Units. However, for existing WBL Academic Practitioners these supports do not fully meet their development needs. The analysis of the biographical data of participants casts some light on the career paths of those currently engaging in WBL with industry.

The maturity of this group of WBL Leaders and Academic Practitioners raises a concern as to whether, in the context of future development of WBL with industry, there is a sufficient supply of academics with the appropriate experience and/or interest in participating in WBL initiatives with industry.

5. 3 Why WBL Leaders and Academic Practitioners engage with industry on WBL curriculum development and delivery

Participants are motivated to engage in WBL with industry for similar reasons, however, WBL Leaders express their interest from the perspective of their role as a head of School/Department, and WBL Academic Practitioners generally from the perspective of their role as lecturers.

WBL Leaders described the benefits of engagement with industry in terms of their role as managers of a School/Department with responsibilities, such as, the development of their lecturing team, and to ensuring the attractiveness of their School to prospective students and their graduates to employers. WBL Academic Practitioners were mainly concerned with issues which affect their role as lecturers. The next two sections, sections 5.3.1 and 5.3.2, present and analyse the two main motivating factors in respect of WBL Leader and Academic Practitioner engagement with industry.

5.3.1 First motivating factor for engagement with industry - WBL with industry is a mode of academic development which generally enhances the development and delivery of institutional curricula which are contemporaneous and applied

All WBL Leaders stressed they are keen that lecturers in their School receive developmental opportunities which ensures their School has the capacity to

deliver a contemporary and applied curriculum to all of the Institute's students. WBL Leaders consider involvement in WBL programmes with industry as resulting in benefits beyond those arising from a single individual WBL programme with industry. They said delivering a contemporary and applied curriculum results in institutional benefits such as employer recognition of programmes, attraction of students to their School and enhancement of graduate employability. In respect of the importance for Schools and lecturers to be connected to industry, WBL academic participants in Engineering, Built environment, and Science referred to the importance of particular sectors and professional and/or regulatory bodies. Academic participants in Business referred to the importance of industry generally with two WBL Academic Practitioners particularly interested in one specific sector wherein their career outside of HEI is rooted. WBL Leaders also outlined how they believe that engagement with industry representatives on curriculum development and delivery is a stimulating and interesting developmental opportunity for lecturers. Generally WBL Leaders said external interaction with industry encourages lecturers to remain open and alert to developments in their field:

> Well, the engagement with industry is a way of getting (a) the name of our School around the industry we serve, the professional body, we serve and the public and also it's just by the very doing of those sort of activities you engage with colleagues, you do new things and therefore you update your skills a little bit, you extend your skills into areas you wouldn't have done unless you did that project, so it's those sort of motivations . . . because you get to learn about the profession and it's a way of getting information back from the industry to our students, keeps us and me current with what's going on out in industry, makes our students more marketable, it builds credibility with industry that our students are going into, so those sort of motivations.(WBL Leader, Built Environment)

> and this is one of the unseen benefits of this type of activity, academic staff can be very closeted, they can have a very narrow view of their world, defined by their areas of expertise, and it really benefits them hugely and it benefits their students hugely for them to be exposed to this type of activity. Not all academic staff are suitable or interested in this, this working with industry, but the more that do get involved the better they become. So I would be looking to encourage more of our staff to interact, at whatever level they wish to, to interact with corporate sector partners. (WBL Leader, Business)

The findings suggest that when considering whether or not to engage in WBL initiatives with industry, HEIs need to consider not just the immediate benefits resulting from collaborating with industry on an individual WBL programme, but also the wider and longer term benefits of engagement.

WBL Academic Practitioners outlined how they are motivated to participate in WBL programmes in order to maintain a contemporary and applied knowledge base:

> I get updated information. Anything that changes I know about so I come back here with the information . . . . some staff may be here for 20 years and have not been in contact with the outside world as such . . . they're out of touch so you know their notes could possibly be outdated . . . . (WBL Academic Practitioner, Engineering)

> Having settled into the Institute I was quite anxious because I had quite a lot of experience from, you know, prior to joining the Institute . . . of working with companies and I suppose with the real world, I was anxious to stay in touch with that. (WBL Practitioner, Built Environment)

Participants identified industry as an importance source of contemporary knowledge. For example, one WBL Practitioner gave an example of how they are teaching WBL students/employees who currently have to address dramatic changes in their sector as a result of the recession. This WBL Practitioner pointed to the very real challenge which this presents for teaching:

> Even journal articles you know by the time they're approved and get into journals they're a couple of years old . . . the recession . . none of the journals articles talk about recession, it's too soon. So you're reading articles and you're trying to keep up to date. There're no new theories on the recession, so it's kind of what the guys are doing and how they're reacting to it, and I find that interesting. So I like to have that aspect, and you know, being involved in these courses . . . gives me access to some of these people. (WBL Academic Practitioner, Business)

Through working on WBL programmes with industry this WBL Academic Practitioner (Business) said they are able to inform their teaching practice generally, not just by listening to the experiences of students/employees, but also through meeting and working with other senior industry representatives. According to this participant, engaging with these senior industry representatives gives them access to knowledge around strategic responses and developments arising from the recession. Also, as this participant is often invited by the media to comment on the latest trends and developments in a particular sector they believe they are better placed to do so as a result of their engagement with industry on WBL programmes:

> Now if there's something happening, if I was going on the radio, I could ring X (name of senior industry contact person) up and say X (name of senior industry contact person) what's your point of view, now without quoting him . . . I know . . . for example what Y (name of company omitted) are doing for the next year. I know the problems they're facing now even though you know I won't articulate those to somebody else but I know because he's been telling me and keeping me informed. (WBL Academic Practitioner, Business)

The above example points to the challenge for the academic community to have developmental opportunities which inform their teaching practice in 'real time' and support them to theorise unfolding practice, not only for

students/employees on a current WBL programme, but also for students generally.

In some cases in Engineering the provision of up-to-date equipment and or industry training by an industry client to a School is linked to these academic staff subsequently providing training to employees of the industry client. So, for these academics in Engineering the benefit of industry clients providing up to date equipment and industry training is seen as vital in order to maintain a contemporary knowledge base. On industry supplying up-to-date equipment a WBL Leader and a WBL Academic Practitioner commented:

> So along with getting the technology it meant that our lecturers went out to the industry they actually were staying up to date with the current technology. (WBL Leader, Engineering).

> All of a sudden we went from being low tech, chasing the pack to being ahead of the pack, all of a sudden we went from being behind everybody to being the leaders . . . . (WBL Academic Practitioner, Engineering)

Aside from wanting to maintain a contemporary knowledge base during the interviews participants generally presented as enjoying their involvement with WBL initiatives and find it a stimulating activity:

> It's a bit of fun . . . it's interesting . . . it's meeting new people . . . it's developing new courses . . . (WBL Academic Practitioner, Science)

Key issues arising from the findings

The findings raise a number of key issues. Firstly, WBL Leaders and Academic Practitioners identify industry as a critical source of contemporary and applied knowledge. Secondly, WBL programmes provide access to contemporary knowledge in 'real time', that is, as industry developments are

unfolding. Thirdly, access to real time knowledge informs teaching generally. Fourthly, traditional academic methods of disseminating knowledge are, at least for some academics, inadequate or need to be supplemented by other modes of academic development, such as, engaging in WBL with industry. Fifthly, the findings reveal that for some Schools industry provides access to technology and training which is an additional, and possibly not counted, resource for these Schools over and above any fee income generated by WBL programmes with industry.

Academic participants cited access to contemporary knowledge and a desire to remain connected with practice as reasons for engaging in WBL with industry. Participants presented as being dissatisfied with HEIs' policies around facilitating their academic development as it relates to their remaining connected with industry. While academic participants perceive engaging with industry as facilitating their accessing contemporary knowledge and supporting their remaining close to practice, further research is needed to interrogate academic participants' understanding of contemporary industry knowledge as it relates to their role as academics. A desire on the part of academic participants to access contemporary industry knowledge should not lead to assumptions that they hold negative or positive beliefs around academic constructions of knowledge or believe that industry's construction of knowledge is superior/inferior. These are issues which merit further research. During the course of the interviews academic participants were keen to stress the educational nature of the programmes they develop and deliver and that these programmes must meet their Institute's academic

standards. Equally they were also keen to stress the benefits of having access to contemporary knowledge and practice.

5.3.2 Second motivating factor for engagement with industry – engagement in WBL with industry represents a continuation of a tradition of service to industry, part-time education, and alumni

Analysis of the data reveals WBL Leaders are strongly committed to the Institute's tradition of close affiliation with industry and to meeting the needs of part-time students. However, the findings also reveal that the government's funding policy does not support HEIs providing a coherent and consistent service to industry. Among senior functional leaders in the Institute engaging with industry is seen as a fundamental part of its mission, but there are challenges surrounding the financing of initiatives such as WBL with industry, as well as the financing of higher education generally:

> Often despite government policy you know which tends to preferentially fund full-time undergraduate education within a particular age range whereas the whole emphasis in industry tends to be more part-time continuing education etc which has to cover its own costs. So it's a key of the mission, from a mission perspective if you want, but is not from a funding policy perspective but providers should do, and continue to work on, trying to get the policy environment, the funding environment, to give equity to part-time continuing education to what it gives to full-time education . . . . (Head of the Institute)

All WBL Leaders see engagement with industry through WBL programmes as the continuance of a tradition of engagement with and affiliation to industry. The Institute in which the WBL Leaders and Academic Practitioners are based, as outlined in Chapter 2, the Contextual Review, has its origins in the provision of vocational education. It is possibly unsurprising that academic staff who joined an institution with a tradition of vocational education wish to maintain affiliation to industry and part-time education.

Participants referred to the transformative value of the WBL programmes to the lives of students with participants also alluding to HEIs contribution to economic development:

> We've changed their lives, we contribute to the economy. I don't know how you put a value on it . . .I've no idea if you want to put the euro value on it. (WBL Academic Practitioner, Business)

While WBL Leaders see the generation of additional funds as contributing to activities within their School/Department this was not presented as an important reason to engage with industry but rather as a by product of engagement. WBL Leaders motivation is rooted in their shared sense of tradition that the Institute offers continuing professional development opportunities to alumni who are based in industry and/or who are members of their profession.

The Institute is moving towards the establishment of autonomous units with operating costs and income/losses assigned to individual units. It is recognised that it is challenging to source additional income to support some activities or to cross subsidise activities:

> I think all third level seem to struggle with the administration and with how . . . do you do this stuff (that is WBL with industry). I think it is absolutely vitally important to secure income from whatever source it is, and to be honest with you, a level 6 that generates significant income could be the thing that funds a level 10 that generates nothing across the Institute, and it's you know, I know they're kind of financially based values, but you do have to have your cash cows to develop new things and I don't mean that in any . . . . (Head of Finance)

The WBL Leader in Business, which has significant engagement in WBL programmes with industry, said he believes there is:

> The opportunity to develop relationships and the opportunity to earn real finance on this type of activity is massive. (WBL Leader, Business)

This WBL Leader also said at the initial stages of the development of relationship with an industry client academic staff do not receive any additional payments, despite demands on their time, as it is considered important they are committed to the programme. While referring to the potential to generate income from the activity this WBL Leader expressed a desire to provide a continuum of educational opportunities for students and alumni from undergraduate to postgraduate level.

Earning additional personal income was briefly referred to by three WBL Academic Practitioners as a benefit of engagement. The findings suggest earning additional personal income is not a significant motivating factor among WBL Academic Practitioners.

> So in some cases we had people do it on a pro bona basis, they've literally just done it because they felt it was important that they do it for the company. (WBL Leader, Science).

One WBL Academic Practitioner described how the travel involved in working with industry results in some inconvenience to the participant's personal life. A number of WBL Academic Practitioners referred to taking phone calls from industry students during out of hours and at weekends. One WBL Academic Practitioner said the cost of mobile calls to students while they were abroad on School business was borne by them.

<u>WBL with industry as an institutional income generator</u>

Analysis of the data suggests that while commitment to serving industry and part-time students is strong, there is increasing pressure both institutionally

and at local School level to ensure all programmes are at least self-financing and scrutiny of the operating costs of offering all programmes is likely to increase. The data reveals how a traditional service to industry and part-time students is becoming part of the discussion and debate surrounding the financial challenges confronting the Institute and the move to make Schools self-financing units. The findings suggest while the financing of the Institute is focussing attention on activities such as WBL with industry what is unknown is whether this attention will result in more or less WBL activity and whether financial issues will have a more prominent role in decision making in respect of engagement in WBL with industry.

5.4 How WBL Leaders' and Academic Practitioners' engagement with industry is initiated.

Section 5.4.1 below presents and analyses the findings in respect of how WBL Leaders and their School/Department initiated relationships with industry resulting in WBL programmes. Section 5.4.2 then presents and analyses how individual WBL Academic Practitioners became involved in WBL curriculum development and delivery.

5.4.1 Schools' engagement with industry is as a reactive activity dependent on reputation and relationships

WBL Leaders and Academic Practitioners described how relationships with industry are initiated. In the majority of cases School/Department involvement in WBL programmes has been a reactive activity with industry clients attracted to a School/Department by virtue of their reputation or the existence of relationships which result in direct or indirect referrals to the School. The table below provides a summary of participants' descriptions of

how interaction with industry arose. It must be stressed that there may be other sources of industry clients but these are the ones highlighted by participants during the course of the interviews:

Table No. 5.4

The sources of industry clients

Source of industry client	Characteristic	Nature	Discipline/s
Alumni	Relational	Past student now based in industry contacts either a School/Department or a former lecturer	Business Built Environment Engineering, Science
Cold call from company	Reputational	Indirectly industry has heard of a School or an individual lecturer	Business Engineering
Full-time lecturer	Relational	Through networking of full-time academic staff	Engineering Science
Part-time lecturers who work full-time in industry	Relational	Part-time lecturers refer company/introduce company to Institute	Science
Institute responds to a policy document in the public domain	Proactive and also possibly reputational	School proposes an educational response to a policy document resulting in an educational initiative being announced via competitive public tender which School won	Business
Establishment of an Industry Steering Group in respect of new Programme Development	Proactive and then also relational/ reputational	School establishes an industry Steering Group for development of an on-campus programme resulting both in a new on-campus programme and subsequently one industry client requesting in-company delivery of the programme.	Science
Marketing	Proactive	Advertising in Trade/Professional Journals	Engineering Science

WBL Leaders are aware engagement with industry is mainly reactive rather than as a result of a proactive and/or focussed strategy:

> No they (that is industry) come to us with an idea that they want something and of course they have a bottom line as to what they want but they don't know what we can deliver. It's one of our failings as a Department is that we haven't fully sold our wares if you like outside and we're getting better at that but generally you will find that the person who has come to us, in many, many cases, somebody that's been a student with us ten years ago or fifteen years ago and remembers that back there in . . . and they will link up with either by cold calling into the Head of Department or may be a lecturer that they've known back in those times and it is those links that allows us develop. (WBL Leader, Engineering)

WBL Leaders also referred to having industry representatives on panels or committees associated with their School/Department such as validation panels and advisory boards. Industry representatives on these panels and committees not only contribute to the development of the curriculum but also enhance the reputation of their School/Department. However it is evident that while the contribution and support of industry is considered important there is an absence of a strategic approach to attracting industry clients. Any marketing undertaken is ad hoc and fragmented. The WBL Leader, as quoted above, reported industry may be unfamiliar with the range of programmes which their School offers. Another WBL Leader (Business) outlined how when his School decided to proactively respond to a government commissioned report by way of a submission, the School was subsequently successful in a competitive tender process which had been initiated as a result of the School's submission.

Questions over the adequacy of resources to enable a strategic approach to engagement with industry and the likelihood of their provision

WBL Leaders and Academic Practitioners are, as evidenced by their long engagement with industry, committed to the activity. They are aware that much of it is dependent on the reputation of their School/Department and existing relationships with industry:

> You do use a lot of personal contacts and maybe that's the way we have to continue doing these things but I think from a marketing perspective certainly . . . we need to get our act together. (WBL Leader, Science)

The above WBL Leader (Science) also said he believes the Institute needs to develop a "coherent strategy in terms of how we actually externally involve with industry". Several WBL Leaders and Academic Practitioners indicated they do not have sufficient time themselves or resources to 'ferret' out new company clients.

While to date, by virtue of reputation and relationships, Schools have successfully attracted industry clients a more proactive approach to attracting industry clients might offer additional and more focussed opportunities. Enacting a strategic approach to WBL will require additional resources. However, these may be difficult to obtain as due to the recession higher education generally is confronting increasing demands on reducing resources.

5.4.2 WBL Academic Practitioners' engagement with industry described as a 'voluntary' or 'goodwill' activity and the challenges for WBL Leaders of having access to sufficient academic 'capacity' and 'competence' to provide WBL programmes to industry

This section presents and analyses the findings in respect of how WBL Academic Practitioners became involved in WBL curriculum development and delivery with industry. It also outlines the challenge WBL Leaders confront in having access to adequate academic resources to develop and deliver WBL programmes.

The words 'voluntary' and 'goodwill' were used by both WBL Leaders and Academic Practitioners to describe academic involvement in WBL programmes with industry. WBL Academic Practitioners indicated their involvement in WBL programmes with industry is voluntary. Many of the WBL Academic participants have established a professional profile in industry and act as points of contact when referrals from industry are made to the Institute. All of the participants presented as willing to participate in WBL in industry and a few had actively asked their School/Department to get involved. One WBL Academic Practitioner (Business) outlined how when they initially got involved in working on a WBL programme they had received support and encouragement from an experienced Head of School who informally mentored them.

WBL Leaders outlined how they believe not all members of the academic community are suited to working with an industry client. WBL Leaders and Academic Practitioners directly and indirectly outlined the criteria which they believe academic staff needs to possess in order to successfully engage with

both employer representatives and student employees. These criteria are discussed in Chapter 6 which looks at what happens when industry representatives and academic personnel collaborate on curriculum development and delivery. Some WBL Leaders and Academic Practitioners believe the Institute's recruitment policy has shifted from recruiting experienced industry practitioners to recruiting 'career academics':

> And this notion of being connected with industry that is a very interesting one. The best way of being connected with industry often is to have worked in industry and to have connections in industry. Of course our recruitment model now is biased against that. It used to be when I came in here it was a requirement that you had to have spent three years working in industry, not in academia but in industry, you had to have spent three years post qualification in some industry before you came in to lecture . . . But we're not closely allied to industry as much as we were in the past, we're moving away from it, we're becoming like a traditional university which effectively recruits academics and rather than taking people with experience in industry and converting them into academics, we're recruiting people who are career academics and that's a big issue. (WBL Leader, Built Environment)

> We had a rule . . . . to teach in many areas you had to have three years industry experience. I would reintroduce . . . . (WBL Academic Practitioner, Business)

According to the Head of the Institute, the Institute's recruitment policy has not changed but a change in the 'qualifications demographic' has resulted in an increase in the number of applicants possessing doctorates. The Head of the Institute outlined how prior to the recession it had been difficult to attract industry applicants as most of the academic appointments are made at the level of Assistant Lecturer and for many potential industry applicants the salary attaching to this grade would be unattractive:

> The effect of that when you actually look at the mechanics of the recruitment process is those people have got broadly similar industrial experience and yet one is better qualified with a PhD and obviously they then, you know people who are unsuccessful saying well that's because they have a research background in fact it's not, it's got to be their educational attainment you know so, so there's not a policy but I think there is a shift in the qualification demographics in those applying to us and so you employ from a demographic in recruitment. So there's been a demographic shift out there and people are better qualified, better research record but can demonstrate comparable industry experience or may be occasionally slightly less but they make up in the other categories, they're more likely to get appointed. So I think it's more a change in the demographics of people bringing themselves forward for academic appointments rather than a preference on the Institute's part for those with industrial experience. I should say there's another little twist in this one as well and that is most of the appointments we make are at the AL level you know entry level appointments and that kind of stuff you know. Historically, it's changing now with the recession and other things, but historically you know you wouldn't have got people from industry because they would have been earning a lot more from that point on the scale so it wouldn't have been attractive to people to come in particularly with substantial industrial experience. (Head of the Institute)

The Institute's Head of Human Resources said decisions surrounding the appointment of academic staff are made by the academic community and the role of the Institute's Human Resources Unit is to support the recruitment and selection process. The Head of Human Resources said within the Institute there is perhaps:

> a greater sense of recognising that the role of the academic is more than just teaching and there is a sense in which other skills or abilities that they bring to their teaching role within the Institute is important . . . . (Head of Human Resources)

At institutional level there is awareness of the evolving role of the academic and prior to the recession the Institute was aware of the difficulty of attracting industry personnel to join it. There is clearly tension between the

perceptions of WBL Leaders and Academic Practitioners and institutional leaders in respect of the Institute's academic recruitment policy.

A WBL Leader (Business) outlined how a contract with an industry client had specified that external experts be included on the academic team delivering the programme. In order to employ these external experts it had been necessary to utilise the Institute's procurement system. Utilising both existing academic staff and external industry personnel or specialists appears from the perspective of WBL Leaders and Academic Practitioners to be a bureaucratic and time-consuming process. If a WBL programme is to be delivered during the academic year using existing academic staff then the situation is further complicated by needing to 'backfill' the teaching duties carried out by lecturers and this may be further complicated if the particular lecturer performs service teaching for a second School. In describing the situation a WBL Leader (Business) said there is a lack of institutional understanding. According to this participant, in order to engage in WBL with industry not only do Schools need to have surplus lecturing 'capacity' they also need to have a supply of lecturers with the appropriate 'competence' to engage in WBL with industry. This WBL Leader (Business) believes these issues are not fully understood or appreciated by Functional Leaders within the Institute who he says believe that a 'unit', that is a lecturer, is a 'unit' interchangeable in any lecturing environment. During the course of the interviews concern was expressed that due to the recession the moratorium on recruitment in the public sector will make the recruitment of part-time industry lecturers or external specialists more difficult. This moratorium, as

outlined earlier in the Contextual Review, involves HEIs operating under an Employment Control Framework (ECF) which allows HEIs to fill appointments only if they achieve an overall reduction in staff numbers as specified by the Higher Education Authority

Functional Leaders outlined that while the Institute is committed to working with industry, and it is a fundamental part of the Institute's mission, pressure on resources and the absence of a national funding policy in the area makes it increasingly difficult to deliver in all of the areas the Institute would wish to do so. The Institute's strategic plan indicates that its research activity is growing in respect of its importance to the work of the Institute. Raising the profile of one activity, such as research, may inadvertently result in a perception that there has been a reduction in the value of another activity, such as WBL with industry. The views of all of the participants have raised complex and challenging issues for higher education generally and demonstrate it is not easy to resolve issues around the "tired old 'teaching versus research' debate" (Boyer, 1990, p.16).

5.5 Summary

Chapter 5 presented and analysed the findings arising from the data collected in respect of the biography of participants, the motivation of participants to engage with industry and how relationships with industry are initiated.

The data suggests that for WBL Leaders and Academic Practitioners there is alignment between an area of activity which they are interested in engaging in

and local School/Department support for their engagement. While the majority of participants began their careers in industry it has been some years since they have worked in it. Participants construct their professional identity to include a strong desire to maintain their connection to industry. These participants enjoy direct interaction with industry. Locally traditional commitment to both engagement with industry and to meeting the needs of part-time students encourages those who wish to maintain their contact with industry to do so. All participants expressed a strong desire to provide continuing professional development opportunities to industry and lifelong learning opportunities to part-time students generally. Early career experience in industry influences participants' interest in engaging in WBL with industry. It is also clear from analysis of the data that the local commitment of a School to engagement with industry is also an important influencing factor as it encourages and supports academic staff to engage with industry.

Participants strongly identify industry as providing them with access to contemporary knowledge and exposure to practice. Participants believe traditional modes of academic development need to be supplemented by close interaction with industry in order to maintain a contemporary knowledge base and to acquire insights into its application in a timely way. Further research is needed to explore participants' understanding of contemporary knowledge as it relates to their engagement with industry.

Participants believe WBL with industry results in benefits which impact positively on their Schools and the Institute generally. WBL with industry maintains the capacity of academic staff to deliver a contemporary curriculum which enhances the reputation of Schools among prospective students and employers. Also, some Schools rely on industry to provide access to up-to-date technology and training.

From the perspective of Schools in the Institute, WBL with industry is mainly a reactive activity with other demands on time and resources making it difficult for Schools to be proactive. From the perspective of the WBL Academic Practitioners their participation is voluntary. The mature profile of participants, financial pressures on the Institute, and perceptions around where WBL with industry fits in terms of its purpose, priority and recognition in the Institute leaves WBL with industry at something of a crossroads in respect of its future development, recognition and resourcing.

Chapter 6

Findings and Analysis in respect of WBL Leaders' and Academic Practitioners' experience of WBL curriculum development and delivery with industry

". . . maybe it's not for me or okay I'll work on that"
(WBL Leader, Engineering)

"It's all about relationships"
(WBL Academic Practitioner, Business)

6.1 Introduction

Chapter 6 presents and analyses the findings in respect of the experience of WBL Academic Leaders and Academic Practitioners when they collaborate closely with industry on WBL curriculum development and delivery. The Findings and Analysis focus on the key themes which emerged during data analysis.

6.2 The complexity of managing industry partnerships – from single employer partnership to multiple employer partnerships

A number of different types of relationships with industry were identified and are summarised in the table below:

Table No. 6.1

Types of Industry Engagement[1] (Indicative)

Type (that is lead employer/body working with the Institute)	**Discipline/s**	**Location of Students**
Single employer which may be a public/private sector employer (but in a number of instances company is large and operates in a number of locations)	Business, Engineering, Built Environment, Science	Direct employees of company
Professional Body	Built Environment	Employees of member companies of professional body
Sectoral initiative (involving a lead body and a large number of different employers)	Business	Employees of member companies of sector initiative
Private company which provides an educational/training service to client companies	Science	Employees of a private company's client companies

For convenience a short summary of the data contained in the above Table is outlined below. The data indicates there are a number of different types of industry partnerships:

- Single public/private sector employer (which in many cases are large companies with several sites in Ireland/abroad) where students are direct employees of the company;
- A professional body where the professional body partners with the Institute on behalf of member companies where the students are employed;
- A sectoral initiative where a number of different companies have come together and the students are employees of these individual companies;
- A private sector company which provides commercial services to its client companies where the students are employed.

The Institute's Head of Quality Assurance, who has been involved in industry partnerships for many years, is an advocate of these partnerships as he maintains they facilitate student access and progression. According to the Head of Quality Assurance the Institute's experience with industry

[1] It should be noted that Table 6.1 only includes the types of industry partnerships as outlined by participants. It is not purported that this Table includes every type of partnership which the Institute may have with industry.

partnership has been positive. However, requests for partnerships from individual small companies are often problematic. Small companies may have difficulty meeting some of the criteria required under the Institute's risk assessment policy, for example, in respect of their "finances and structures". Also some applications had been unsuccessful:

> because we didn't have the confidence that these organisations would be able to run a programme on our behalf . . . so we've been quite careful with the bodies we've worked with. (Head of Quality Assurance).

While the Institute has been involved in partnership arrangements with employers since around 1996/97 there is evidence that the types of relationships with employers are increasing in complexity. One WBL Academics Practitioner (Business) has responsibility for a sectoral initiative comprising of a lead body plus 40 different employers. This presents challenges for the WBL Academic Practitioner. For example, the WBL Academic Practitioner (Business) referred to the difficulty of involving and sustaining the involvement of so many different companies. On occasions intervention had been needed to encourage all of the companies to attend curriculum development or review meetings. Also there were issues outside of the programme, such as company rivalry or disagreements, which discouraged interaction among companies:

> Now with X Company you're dealing with the one company, which I think is actually easier. With the Y (initiative) you are dealing with forty companies in the Z sector. So that makes it more difficult and we have dealt with that in a different way. I know with the X (Company) programme we just meet with the X (Company) HR people and their Training people and that works out very easy and it's a very close knit . . . but with the Y (initiative) it's a different . . . because you are working for a whole sector .. . you've got a completely different disparate groups . . . .
>
> It's when you start to get this huge group and sometimes they don't want sit at the same table as one another, they might even have disagreements . . . . (WBL Academic Practitioner, Business)

The above WBL Academic Practitioner (Business) referred to the time consuming nature of sectoral initiatives which involve not just a lead body but different types of businesses within the sector.

The WBL Leader (Business) outlined the skills required to project manage a WBL programme:

> I would go back to the core skill of a good project manager as being critical. The understanding of the academic model is easy, you can obtain that, I would say that, these particular individuals would not be required to design programmes but would certainly have to have the understanding, ability to interact at a high level and bring a team together and act as that continuity person, I think that's critical. We're doing it here at the moment but it's an additional job on top of many other jobs. (WBL Leader, Business)

The above WBL Leader (Business) outlined how it had been necessary to use academic staff to manage some partnerships however "good people as they are they may not have the requisite skills to do it as well as we should be doing it".

The time consuming nature of partnership and the increasing complexity in respect of engaging with employer partner/s calls for the academic practitioner, who has special responsibility to act as the liaison person with

the partner/s, sometimes referred to as a programme manager, to have additional skills over and above the skills required when managing a programme which is internally initiated and delivered within the Institute. The WBL programme manager needs to possess the interpersonal skills to engage with the partner/s representatives, and also in some cases, the skills to sustain the involvement of other employer partners. In some instances this is more difficult due to the dispersed geographic locations of employers and/or diversity among employers. While all partnership development may involve some challenges those which comprise of many stakeholders will be inherently more complex to develop, and as outlined by a WBL Academic Practitioner (Business), more challenging to manage and support. The WBL Leader (Business) outlined how his School favours commencing relationships with an industry partner with a minor award as this allows for development of mutual understanding and relationship building.

Many participants referred to the importance of relationship building with employer representatives and that relationships require time and effort to develop. From the perspective of the Institute's role in partnership development it is evident from the findings that relationship building requires experienced and skilled WBL Leaders and Academic Practitioners. While the Institute has formal processes for the establishment of partnerships with formal partnership agreements put in place, as far as I have been able to ascertain, there is no formal training provided either to WBL Leaders or Academic Practitioners. The activity relies on the WBL Leaders and Academic Practitioners who, over many years, have developed

their experience and skills of partnership building. Some participants believe they alone have had to carry the burden of resolving difficulties which arose in partnerships and suggested that in the early stages of their involvement in WBL partnerships they would have benefited from greater support. One WBL Academic Practitioner (Business) did seek out and received guidance from experienced colleagues. This participant recommended that academics in the early stages of working within partnerships should be encouraged to seek advice and support from more experienced colleagues.

6.3 WBL with industry requires the 'right' academic team

According to both WBL Leaders and Academic Practitioners successful partnership with industry requires the 'right' academic team. The notion of the right academic team was described in terms related to the knowledge, skills and interpersonal qualities possessed by the academic practitioner.

WBL Leaders and WBL Practitioners emphasised that when engaging with industry academic staff need to have contemporary knowledge of a sector otherwise:

> Those who might give them lectures from a theoretical perspective but would not be on top of the knowledge base that the students would specifically have, they could have their credibility on the line very quickly and I think you've got to chose a lecturer that, you know, is able to communicate with those guys at the level they want to be communicated at. If you have somebody who was highly theoretical and, may be, focussed on some aspect of the work that, you know, doesn't bite with the students you could have a credibility problem. (WBL Leader, Built Environment)

WBL Leaders and Academic Practitioners referred to the fact that academics need to possess 'credibility' with both industry representatives and students and this credibility rests in them having contemporary industry knowledge and the ability to connect theory and practice. A WBL Academic Practitioner (Business) said lecturers would be 'devoured' if they could not connect with the students' experiences and students very quickly "cop on to fake" and "identify very quickly if the lecturer only has academic knowledge".

For some WBL Academic Practitioners (Engineering) involvement in WBL programmes industry is viewed as critical as this enables them to participate on industry training programmes some of which take place abroad. After completion of these programmes WBL Academic Practitioners deliver WBL programmes to students based in industry and also train other academic staff.

WBL Academic Leaders and Academic Practitioners outlined that to engage in WBL with industry those involved need to have:

- Excellent communication skills – a willingness and interest in listening to industry representatives and to students' industry experience and to actively engage in conversations with these representatives and students around their needs and experience;
- A willingness to take feedback, both positive and negative, from industry representatives and students;
- Personal contemporary industry knowledge and experience in order to connect theory to practice and also the skills to facilitate students connecting practice to theory;
- Empathic with the situation and needs of part-time students many of whom are undertaking a programme with their immediate work colleagues, and who may have been out of higher education for some time, or never attended higher education before;

- The disposition to develop relationships, sometimes to be sustained over a number of years, based on respect, trust and confidence. In some cases WBL Academic Practitioners are in the early stages of a relationship informally *'selling'* (WBL Academic Practitioner, Business) the merits of a programme to company representatives;
- Interested in own personal knowledge and skills development and in some cases willing to undertake industry based training;
- Organisational and project management skills (required especially by WBL Academic Practitioners with special responsibilities for a programme or an industry relationship);
- Flexibility – willing to deliver programmes off-campus both in Ireland and abroad;
- A willingness to participate on a curriculum development and delivery team comprising of industry/part-time lecturing personnel as well as their own internal academic colleagues;
- Knowledge of internal processes, for example, quality assurance, registration, examinations.

A WBL Leader (Built Environment) outlined how he believes he does not have the authority to question academic staff directly on whether they are keeping up to date in their field. Functional Leaders believe it is 'inherent' in the role of an academic staff that they maintain a contemporary knowledge base. Within the Institute, School and Programme Reviews appraise the quality of programmes. The Institute has recently introduced the public sector Performance Management Development System (PMDS) which involves an annual review of employee development needs. The importance for academics to maintain a contemporary knowledge base is agreed on by all participants. However, there is dissatisfaction among WBL Academic Practitioners that they are enabled to do this. In order to understand the views as expressed by the WBL Academic Practitioners in this research study in respect of their academic development needs, further research to explore WBL Academic Practitioners' and institutional understanding around contemporary knowledge needs to be undertaken. Due to its relatively recent introduction it is difficult to assess whether PMDS

will result in any changes in WBL Academic Practitioners' experiences and beliefs around the Institute's role in and support of their development. Also as PMDS is a generic system developed for the public sector whether it will adequately address the specific concerns of WBL Leaders and Academic Practitioners is unknown.

6.4 WBL participants' beliefs around collaboratively developing a curriculum with industry – listening to industry, learning from industry, staying involved and committed

WBL Leaders and Academic Practitioners believe that in order for their School to successfully partner with industry the academics involved need to be willing to engage, listen, learn and sustain commitment over time.

The importance of being willing to listen to external and non-academic contributors to curriculum development, the employer representatives, is considered very important and WBL Leaders and Academic Practitioners understand this is part of the process of WBL curriculum development with industry:

> Well the difference I would see between developing a programme for people who are coming is obviously in regular teaching I decide what's important I deliver that and to a certain extent the students take it and assume that I know what I'm talking about. With someone who's coming in with a specific aim you have to listen to them a lot more. I mean you have to design a programme that suits them and there's probably a lot more toing and froing I mean if I develop a course document here, you know, I decide what the course is going to be about, I decide what the delivery is going to be like, what the practicals going to be like and after it goes through quality assurance in the Institute. . . . (WBL Academic Practitioner, Science)

A WBL Academic Practitioner (Engineering) described how their School has had to move from providing what it could deliver to providing "them (industry) with what they want". The WBL Leader (Business) named its style of partnership as its "collaborative design process" which it considers is not prescriptive but:

> On a joint basis deciding what the objectives of the programme are, deciding what competencies are required and building a programme around that. (WB Leader, Business)

This collaborative design process includes WBL Academic Practitioners visiting companies:

> I think it is critical and that is why you would have to spend the time getting the staff acclimatised to the organisation, the way they work and identifying, I mean, part of the collaborative design process is collecting 'war' stories, collecting jargon about that industry because it's a way in which you can make the connection, staff member can make the connection with the participants by using the language of the sector and equally then, another key element would be to . . . to ensure the sort of work that they are doing in session and the work they do after session, by way of project work, assignment work, is very much work-based, so what we tend to do, and it's a design you know we have used for a long time, is to align much of the learning that is designed into the modules, with what's happening, with what's expected of staff members within the organisation . . . .(WBL Leader, Business)

The WBL Leader (Business) outlined how his academic staff familiarise themselves with students' work environment by staff going ". . . out on trucks with deliveries, to find out what they're about".

A willingness on the part of WBL Academic Practitioners to accept feedback from employer representatives is considered to be important:

> It's the lecturers' communication skills and indeed their enthusiasm, you know, and the companies see that very quickly but bear in mind that they are actually paying for a service and it's like any class of a business if you're paying for a service and you're not getting the service that you expected then you're back to the provider and that's exactly what happens but the interaction is very positive and we encourage early interaction by the companies we deliberately say if you have a problem come back to us don't wait till the end or don't allow the situation to develop where well this lecturer has been with us for the last six months and we're very unhappy, tell us the first moment then we can actually do something but most of our, indeed all of our lecturers, I would say are very open to criticism when we sit down with them and explain what's happening, why is the complaint being made, they will either say, okay maybe it's not for me or okay I'll work on that. (WBL Leader, Engineering)

A WBL Academic Practitioner (Business) said they believe when academic colleagues are involved at the very early stages of curriculum development with an employer these academic staff tend to have a better understanding of the background to a programme and the students compared to academics who join a programme team at a later stage:

> And having the lecturers there from day one is always hugely beneficial, the ones that are there early on are so much more clued in and know what the programme is like and know nearly almost how to deal with these particular students because they have been there from day one, it's really useful . . . old hands at it, the likes of X (name of academic colleague) . . . and it's great. (WBL Academic Practitioner, Business)

It may also be that the WBL Academic Practitioners who are involved in WBL programmes with industry develop strong relationships with employer representatives. Several WBL Academic Practitioners stressed how it was 'all about relationships' and relationship building. A few WBL Academic Practitioners, who aside from being involved in curriculum development and/or delivery, also have additional responsibilities. For

example, they may be a point of contact for employer representatives and/or students in respect of issues surrounding the development of the programme and/or ongoing operational matters.

A WBL Academic Practitioner (Business) suggested that other non-academic staff should be part of the team which interfaces with the employer representatives and the students/employees as these WBL programmes are not mainstreamed in respect of the registration of students. Initially this WBL Academic Practitioner had to 'fight' in order for students on a WBL programme to be included in graduation ceremonies:

> I think it benefits students hugely from input from the academic side but I also think that if from early on somebody like the academic secretary was involved they would see the importance of the programme and that it has to fit in somewhere in the Institute's structure I think that would have been helpful, it's kind of now it's becoming very obvious that we do need a slot for registrations, that we do need a slot for graduation but I had to fight for those originally because we really didn't fit anywhere in the Institute's structure and so I think that could have been . . . that would have been much better if they were involved earlier on and continued to be involved, maybe went to a number of the earlier meetings and even to the partnership meetings so they could see when it got to a certain stage and not necessarily development of the modules but development of the programme and how we would handle all of the issues and how we would interface with the partnership. I think that would have been better. (WBL Academic Practitioner, Business)

WBL Leaders and Academic Practitioners stressed the significant amount of time spent attending on-campus and in-company meetings, discussions by phone, and attending to email communication, especially when developing a new employer relationship or a new programme with an existing employer client. A WBL Academic Practitioner (Engineering) said a considerable amount of effort was required when developing a programme with an external employer as the very important but unseen

work involved in co-ordination was much greater compared to a programme which is being developed, for example, for delivery to full-time undergraduates.

In some Schools in (Science and Engineering) when working with industry WBL Academic Practitioners have to be able to deliver appropriate lab-based training or be able to demonstrate their knowledge and skills using the equipment and tools of the industry. This practical aspect to their academic role might explain in part why these WBL Academic Practitioners present as being comfortable and confident with managers from industry and industry-based students. These WBL Academic Practitioners have both the language and the skills of their students/employees. However, the ability to apply theory to a practical situation would not entirely account for the confidence displayed generally by the WBL Academic Practitioners from Schools across the four disciplines researched in this study for two reasons. Firstly, it is some years since the majority of the WBL Academic Practitioners have worked directly in industry. Secondly, in some cases, for example in Business Schools, the nature of the discipline does not always have a 'live' practical aspect to it, and in order to connect theory to practice, academics may use case studies or some form of simulated computer-based learning. I can only speculate as to the reasons for there being commonality of commitment and confidence among the participants across the four disciplines.. This commitment and confidence may be a combination of both early career experience and their subsequently joining a

Department/School which recognises the learning that takes place in the workplace and the potential for academic staff to benefit from active engagement with industry. For these WBL Academic Practitioners, WBL programmes with industry is their bridge from theory to practice.

The experience of the WBL Leaders and WBL Academic Practitioners highlights how they are managing relationships with employers, have adapted to engaging in collaborative relationships with employers, and recognise the need for a team-based approach with some academics having project management or relationship management roles. WBL Leaders and Academic Practitioners have significant, but mainly isolated, experience and are generally working on WBL programmes with industry within their own Schools and even small groups within these Schools. Enhancing both intra- and inter-School awareness of experiences might support the development of an institutional community of practice. One WBL Leader (Engineering) outlined that while he wants the academic team to take ownership of a programme, he does not want this ownership to preclude the involvement of other colleagues. It might be beneficial to explore whether the Schools would benefit from some form of structured and regular engagement with each other which would facilitate greater sharing of knowledge and experiences among WBL Leaders and especially among WBL Academic Practitioners. WBL Leaders may, through institutional meetings, have greater opportunities to informally discuss WBL activities within their Schools. However, WBL Academic Practitioners may have

significantly less opportunities to meet colleagues from other disciplines who share their interest in WBL with industry.

6.5 The WBL Curriculum - it's not all about education, it's the same but different to on-campus programme, involves negotiation and the co-operative sharing of resources

WBL Leaders and Academic Practitioners outlined some of the similarities and differences surrounding the collaborative development and delivery of a WBL curriculum compared to the development and delivery of an on-campus curriculum which has been initiated by the Institute.

According to participants a key difference between the collaborative development and delivery of a WBL programme with industry, in comparison to the development and delivery of an on-campus programme, is the industry client wishes to meet a current developmental goal around a specific issue. Hence some of the uncertainty which exists around anticipating market requirements is reduced:

I think when we are developing a course say an Institute course for undergraduates/postgraduates there're always couched and they're always built upon an external analysis of the market that's part of our approach . . . but I think what . . . the main difference is that you are trying to anticipate future needs at a more strategic level in designing a programme for CAO (Central Applications Office) market and postgraduate market and in one sense you are asking people in industry and in the outside world to help you tease through what the requirements will be in two, three, four, five years down the road and . . in many cases they don't know but it's a judgement call at the end of the day by the project, course team. When you are working with a corporate (company) the degree of unknown is reduced because they are very specific . . . . so you're dealing with a much clearer objective, now it will change and they do change and evolve but at the outset you're responding to much clearer specifications as to what the course should do, what the competencies . . . what the students should be able do as a result. Whereas with the main Institute programmes you're using judgement, and you are using informed judgement as to what the learning outcomes and even the module content should be, for what a student will require at a future date. That would be the main difference, other than that the same degree of research and market validation would go into both.

However, WBL Leaders and Academic Practitioners also indicated companies can sometimes be unclear as to the educational aims of a programme. Generally a number of meetings, both on-campus and in-company, are needed in order to clarify programme aims and learning outcomes. Among participants it was clear while WBL programmes are customised for a particular employer there is considerable use of modules from existing programmes:

> They've no idea what they want. They've an idea that they would like to do something and it's a total waste of time to tell them go away, think about it, develop it and come back to me because it will not have improved in the meantime. You would try to find out . . . what kind of a level, what is it that the people do and then you start planting the ideas, okay. So what I would do is, after the initial talk, and the coffee, and the getting to know you, is say, well, okay, we do all of this stuff, and I think the next stage I would move on to then is may be refine it a little bit and then I'd say okay I'm going to send you forty syllabi, okay, take them purely as subject headings, don't try getting into . . . just look at the subject headings .. . and is there anything there you . . . . that you would like to do. And do you know the extraordinary thing is Sandra that, you know, the X sector if you say pick out twelve, if I ask ten different companies . . . they would probably be within 90% of picking the same ones . . . (WBL Academic Practitioner, Business).

Generally customisation can relate to (i) the particular industry and its environment (ii) particular company systems, for example, information technology systems (iii) performance indicators, for example, financial indicators (iv) policies, for example, human resources. So hence some modules will include specifics related to a company, for example, examining company financial statements in an accounting and finance module or using a company reagent in a workshop. One WBL Academic Practitioner (Business) outlined how the sharing of confidential company data for inclusion on a programme is done on the basis of trust and this trust has been developed over many years. So while a new programme for a company may be developed or an existing programme may be offered (with some customisation), WBL Leaders and Academic Practitioners often use existing modules to initiate and stimulate discussion surrounding the educational needs of a particular company and regularly use these existing modules which are then customised to varying degrees. The sharing of resources, for example, companies providing access to company data, supplying company case studies, or the

input of company specialists at both the development and delivery stages of programmes are, according to participants, important for programme success. According to participants, in some instances WBL programmes could not happen without this sharing of resources. A WBL Academic Practitioner (Science) outlined how their School does not have a sufficient number of academic staff with the appropriate technical knowledge to deliver a particular programme. However, the Institute has resources which companies want to access such as academic frameworks, expertise in pedagogy, and credentialising power.

In some instances, as engagement with an employer progresses, an employer may indicate directly or indirectly that there are non-educational goals related to their desire to develop a programme. For example, non-educational goals may relate to key staff retention, or seeking a cost effective educational/developmental model or a company may wish to get, what one WBL Leader (Engineering) described as, the Institute's accreditation 'badge' for programmes for the benefit of staff and as a mechanism to impress its customers.

Generally among WBL Leaders and WBL Academic Practitioners decisions around the aims, objectives and learning outcomes were described as being undertaken in partnership and in a collaborative way, involving a significant amount of interaction with company personnel both on-campus and in-company. While as outlined earlier it is necessary to tease out what a company wants, one WBL Academic Practitioner (Science) indicated when

working with a company you have to be willing to listen to the company while being confident in your own field and around pedagogical issues.

A WBL Academic Practitioner (Engineering) outlined how working on a WBL programme with industry is more 'complicated' and on occasions requires delicate 'negotiation'. For example, in instances when an employer may ask for the integration of an existing in-company training programme which does not meet the standards of the proposed WBL programme:

> so it's a much more straightforward process (if you are developing a programme without any industry partner involved) whereas if you're developing for the X Company . . . it's much more complicated because they may not have an understanding of what an NQAI level 7 or what should be in there or an accrediting body. Now they might not want it accredited but if we're involved at a level 7 we want it the same level as our other level 7s. So they might put forward ideas that we want this here and we'll say that's not really appropriate . . . so there's a lot more and again you don't want . . . you don't want to be putting them off . . . you know . . . telling them you can't do that but there's a lot more accommodation, a lot more negotiation in that process. (WBL Academic Practitioner, Engineering)

The findings suggest employers need time to become familiar with and develop understanding of the language of higher education and the accreditation process. Employers' acclimatisation into the world of higher education is facilitated by the positive disposition of the academic team they engage with.

6.6 WBL curriculum development and delivery – the continuance of some old debates surrounding education and training and WBL programmes getting equal status and supports as 'mainstream' programmes

Generally WBL Leaders and Academic Practitioners were anxious to stress they are delivering 'academic' or 'education' programmes:

> It's not a 'how to' programme. It's an academic programme. There will be elements obviously there're going to be elements, strong elements, of 'how to' in it but it's certainly is an academic programme. If you were to ask me, what's is the single focus of the programme, it is getting people thinking and, you know . . . even if it's level 6 . . . thinking that's fine . . . but it is getting people thinking. You know you're not going on to the level 8 or 9 type of thing where you're taking the world view but I'd hope you'd be seen outside of the parish, open to ideas. (WBL Academic Practitioner, Business)

A WBL Leader (Business) indicated he views WBL programmes with industry as being "in the area of education and training", and would not draw a distinction between education and training, as within academic programmes there are elements of training such as the acquisition of specific skills. Participants did not appear conflicted around higher educational programmes preparing students for work or developing employees in the workplace. Their main concern is that programmes meet academic standards. A number of WBL Academic Practitioners referred to the changing expectations of employers with employers wanting to employ or develop people who are 'rounded'. Employers now want employees who possess knowledge and skills beyond those which may have been given to a traditional craftsperson or professional and this requires Schools to change their programmes to include new subject areas and interpersonal skills. While the participants interviewed for this research project see their engagement in WBL programmes with industry as having a substantive academic purpose there is

some evidence from participants that this view is not shared by all of their colleagues:

> I don't really think that it is valued at an educational level maybe it's valued as something that is . . . something that we do and it's something we can show off a little bit . . . but I don't think it's valued at the . . educational side of it is valued . . . . (WBL Academic Practitioner, Business)

This WBL Academic Practitioner (Business) said they find it upsetting when industry-based students were referred to as being 'only' part-time students. In their view these industry students are even lower down the 'pecking order' in terms of the supports they receive than other part-time students who attend on-campus in the evening. According to them the industry based students are only important in terms of "lip service" to the activity and "they (the industry based students) get nothing" (in terms of student support services).

WBL Leaders and Academic Practitioners were keen to stress WBL programmes with industry follow the same quality assurance procedures as 'mainstream' programmes:

> People don't know what we're at, don't understand the process. All of these programmes would go through exactly the same quality assurance procedures as a mainstream Institute programme. (WBL Leader, Business)

A WBL Leader (Engineering) explained how some of the engineering programmes which their School offers are vocational programmes. In order for some of these programmes to be converted to degree programmes and placed on the National Framework of Qualifications, the School confronts challenges in trying to meet both academic requirements and vocational/industry requirements. The School welcomes the recognition of prior learning to support meeting these requirements:

> Now the type of training they (industry) want is vocational training, training for the job and our challenge has been and continues to be marrying the academic if you like qualification or education along with that kind of training the advent of the recognition of prior learning is a breath of fresh air for us and we intend to be using that much more. (WBL Leader, Engineering)

One WBL Leader (Built Environment) outlined a debate which is taking place in his School surrounding the granting of an honours undergraduate degree and the recognition of this degree by a professional body:

> But there is an issue there, the one issue that has arisen is with further recognition of that programme by say the X Professional Body because the view is being taken I suppose by others not by . . . not in here, I should say it was taken by some of my own staff in here, about the programme in that the content hours, the lecturing hours, the contact hours, the amount of time spent on theory or spent in lectures is relatively low, the assumption is that they're picking up a lot of what they're learning from their work and that they're more efficient in acquiring knowledge from lectures or they're engaged in the subject. So that's the theory. There's a questioning of whether the amount of hours that they get in academic contact is sufficient to allow them to get to an honours degree standard in the period that they have in four years part-time work to get, you know, a four years honours degree. Now that's a question mark which is I suppose is a judgement call and I'd say we're on the margins of that to be honest with you. (WBL Leader, Built Environment)

Both internally in the School and externally from a professional body questions had been raised whether students were getting enough 'academic' contact hours (i.e. direct teaching from lecturers) to warrant the awarding of an honours degree.

A WBL Academic Leader (Engineering) outlined how sometimes industry needs a fast turnaround in respect of having a programme developed and delivered and at times the Institute's validation process can be slow:

> We tend as an Institute . . . the wheels turn very slowly. There are good procedures we have to go through I'm not suggesting that we should be cavalier in what we do but we should have a system that actually allows somebody like myself to put a module together or a programme together and submit it to go through a validation process very quickly . . . . (WBL Leader, Engineering).

The same WBL Leader (Engineering) said in respect of some short continuing professional development programmes that industry does not always want or need a programme to be validated by the Institute, as the programme already has industry recognition, and industry simply wants to outsource delivery of it to the Institute. However according to the WBL Leader the School's own programmes have recognition and status within industry:

> They probably would go ahead regardless whether it's accredited but they value very, very much and I didn't realise this initially, but they actually value the badge which is the Institute's badge. I don't think that we realise how valuable that particular badge is. I suppose because we're in the middle of the wood we don't see those trees but the value of the Institute (Institute's 'badge') is very, very important . . . . (WBL Academic Leader, Engineering)

This research highlights that participants are concerned with getting equality of status and access to resources within the Institute for the WBL programmes. There is a sense that participants feel they have to defend the academic merits of programmes as well as feeling a sense of injustice that there are inadequate supports afforded to the WBL students.

6.7 The need for clarity surrounding academic roles within WBL partnerships and strengthening the role of workplace supports

This section explores aspects of the findings which indicate there is a need for greater clarity surrounding the role and responsibilities of WBL Leaders and

Academic Practitioners within WBL partnerships, and that employers too need to recognise their role in supporting learning in the workplace.

WBL Leaders and Academic Practitioners reported that generally industry promotes a programme to employees and then employees self select. The Institute supplies standard application forms to the company for completion by the employees and for submission by the company to the Institute. Acceptance on programmes is then dependent on employees meeting the Institute's standard entry criteria. All WBL Leaders and Academic Practitioners stated they use the same eligibility criteria for student admission as are used for other types of programmes. Occasionally an employee has not met the eligibility criteria. For example, in the case of an in-company programme in Science an employee was admitted on an exceptional entry basis as they had a number of years of relevant work experience. In cases where employees have an existing relevant qualification they may get module exemptions or advanced entry. Sometimes when prospective students are seeking exemptions they include 'irrelevant' information in their applications, suggesting they include information of relevance to their role within their organisation rather than in respect of their suitability or eligibility for the programme they are applying for. This placed an administrative burden on the WBL Academic Practitioner (Business) with responsibility for the programme as a 'strict' approach is adopted in respect of the meeting of eligibility criteria.

According to WBL Leaders and Academic Practitioners employees self select in respect of applying to participate on a programme. A WBL Academic

Practitioner (Business) indicated in their experience some companies have their own selection systems in place. These systems vary with employers selecting employees using a volunteer system or requesting employees to write an essay or undertaking an aptitude test:

> The companies . . . but we find it's very varied . . . . we find that the ABC Company just look for volunteers and then people like XYZ Company have. . they actually get them to do a kind of an essay as to why . . . other companies do aptitude testings . . . so in a sort of a way we been trying to streamline that and we had BCC Company come in and explain how they chose theirs, because what you find is that while people volunteering put up their hands and say yes I'd like to do this course some of them wouldn't be able for it and it's very difficult to weed them out. (WBL Academic Practitioner, Business)

Another WBL Academic Practitioner (Business) stated:

> some of them come because they're told to come or the manager . . . . says you go along to that . . . . (WBL Academic Practitioner, Business)

All the WBL Leaders and Academic Practitioners referred to the maturity and motivation of WBL students and the diverse profile of WBL students in respect of educational attainment, age, and work experience. Students were regularly described by WBL Leaders and Academic Practitioners as 'focussed' and very 'motivated'. Participants were in agreement that having a mixed profile of students is beneficial to programmes. However, a number of WBL Academic Practitioners (Business and Built Environment) indicated that having a mixed profile of students can present challenges for teaching and learning, for example, students may have different levels of information technology literacy. In one instance a WBL Academic Practitioner (Business) outlined how they spent a half day teaching basic information technology

skills to a mature student, who although an experienced manager, did not have these skills.

A number of WBL Academic Practitioners (Business and Built Environment) said they would like to have greater input into briefing potential students in respect of what would be expected of students on a programme, for example, around the academic requirements of a programme and what would be involved by way of assessment:

> Some students study really well and seem to have a grasp that this is now an academic course and that they have to have some academic input and content and others, it seems to pass over them and then I wonder about how they were chosen whether it comes up in their background and all that kind of stuff, you know.(WBL Academic Practitioner, Business)

While the Institute still retains ultimate responsibility for selecting students it is clear from the findings, that in some cases, student selection would have benefited from early direct communication between the Institute and the individual prospective students in order to ensure students understood the academic requirements of the programme. Students' personal circumstances or lack of previous experience of participation in higher education may result, as was outlined by some WBL Academic Practitioners, in a more stressful experience for them and also place an additional burden on the WBL Academic Practitioners to support these students.

When describing the delivery of WBL programme where the School had confronted some challenges, the WBL Leader and WBL Practitioners (Built Environment) indicated in some instances it is necessary to provide students

with underpinning foundational knowledge to facilitate students reaching the standard of learning required by the programme:

> Now a couple of things we found when we went to deliver that programme to them. One was in our subject you can get quite far quite quickly with people who have got backgrounds in business but after . . . you can get them to a certain level but if you want to get them to a more advanced level it does take a lot of hard work and a lot of learning. So what we found was we were . . . we went down there, we delivered the material to them, we began to find that they needed some other prior understanding before they could be taken further in their knowledge acquisition . . . . (WBL Leader , Built Environment)

WBL Leaders and Practitioners indicated they are aware the profile of students/employees on WBL programmes varies in respect of their educational attainments, experience of higher education, and their understanding of what would be required of them when participating in a higher educational WBL programme. In one instance a WBL Leader and the WBL Academic Practitioners (Built Environment) involved in a programme found some students/employees had difficulty reaching the standard of learning required by the programme as they did not possess the underpinning foundational knowledge. Another WBL Academic Practitioner (Science) outlined how sometimes they have had to explain to employers that students/employees would need to be provided with foundational knowledge:

> So that sometimes is a little bit of a shock to them that they have to go back to real basics . . . . (WBL Academic Practitioner, Science)

Participants in this research study said that students' results are processed and issued using standard institutional procedures, with the exception that within one School it was indicated that company representatives sit on the Examinations Board in respect of the programme delivered to their employees. This practice may also exist in other Schools but was only

referenced by one interviewee. In this instance a WBL Academic Practitioner indicated that while the company does not issue the results to the students/employees, the company representative on the examinations board retains a copy of the results arising from the meeting of the examinations board. Students/employees on the programme are aware their human resources department gets a copy of the results. While the human resources department does not issue results to students/employees it follows up students/employees who are late in submitting their assignments:

> So the company gets the results first, in other words the human resource people get the results first and they do a lot of the follow up then for people who may have been late with assignments or who may not have . . . . (WBL Academic Practitioner).

A few WBL Academic Practitioners said the issue of access to student results had been a source of awkwardness for them as over the life of a programme they develop close working relationships with company representatives. A WBL Academic Practitioner said they would only supply a company with a general overview on students/employees' progress, for example, giving the percentage of students/employees whose results fell within grade bandwidths:

> And I know one of the companies particularly now, I won't tell you who they are, but one of the companies insisted that we give them the students results and we said no our contract is actually with the student. If you want the students' results you have get them from them. We can give you the bands, we can say, you know 50% of the class had more than . . . but we cannot actually give you the students' results and I felt that was something we kind of needed to put the foot down about. The companies, I expect, I suppose because they were paying for it and they were allowing these students out of work, giving them time off to do it, they felt entitled to the results but we actually felt no our contract is with the students, it's kind of personal information, you know. (WBL Academic Practitioner)

Two WBL Practitioners said that they did not have a difficulty supplying companies with student attendance records with one of these saying that the issue of access to results is 'confused':

> If they ask me did so and so attend I'd probably will say yes because they're probably paying for that. If they ask me what mark they got in such a subject I say he has his transcript ask him. (WBL Academic Practitioner)

One WBL Academic Practitioners described how on realising some students were not attending the programme the manager in the company was 'livid' he had not been informed especially as he had either 'asked' or 'told' them to participate on the programme. This WBL Academic Practitioner suggested it is very important companies have nominated someone to manage the programme internally:

> the company would get feedback on attendance so, who attended, who didn't attend, that was a problem, nobody followed it up in XXX Company or the first year and Y (name of company person) was a bit . . . at the end of the year when he saw some people didn't complete, especially people who were employees of XXX Company that he asked, told to go on the course and that they dropped out, he was livid that he didn't know so . . . . (WBL Academic Practitioner)

A WBL Academic Practitioner said in the early years of one WBL programme student appeals in respect of results had been treated differently to the procedure recommended in the Institute's assessment regulations. Students had initially been asked to discuss their mark with their lecturer. However this approach had proven problematic and the School now follows the appeals procedure as set out in the Institute's assessment regulations:

> now when we started first with X sector there was a couple of appeals 'I not happy with my mark', and you were inclined to let the student negotiate with the lecturer and the lecturer have another look at it and things like that. It's not quality assurance, that's not correct, of course I never say that. You need to . . . .so now we say it's absolutely with the regulations (that is, the regulations governing assessment), everything goes by the regulations, it is much easier for us. You find that you're never in a bind then with going, kind of going should we or shouldn't we, it's very straightforward . . . . (WBL Academic Practitioner)

6.8 WBL Leaders and Academic Practitioners - deficits in institutional recognition and supports

WBL Leaders and Academic Practitioners share similar beliefs and concerns around what they consider are deficits in institutional recognition systems and supports in respect of their engagement in WBL activity.

The next two sub-sections look at the findings in respect of institutional recognition of WBL and supports surrounding both academic development and the daily working lives of WBL Leaders and Academic Practitioners.

6.8.1 Institutional recognition

Many WBL Leaders and Academic Practitioners referred to a lack of institutional recognition in respect of academic engagement in WBL with industry:

> I mean you do as much as you can as the Head of School and say thank you and try and formally recognise what's being done but if the Institute is to be true to its ambition for excellence in the area you'd like to see a lot more practical support put in place. (WBL Leader)

A number of WBL Leaders and Academic Practitioners indicated money is not a significant motivating factor for engagement in the activity or provides

them with recognition for their engagement. Some participants believe that compared to research there is not a *'value'* placed on engagement in WBL with industry and it is not given the same recognition:

> Staff are not terribly worried about the money. It's more the recognition and it's more the understanding that it's actually something they're doing that's valued and that the Institute recognises that it's valuable and there isn't any . . . for example one option might be to give some premium in terms of external teaching even in terms of hours allowance rather than actually direct payment but again it makes life more difficult for somebody in terms of timetabling people but there should be some, some incentive for people to be involved in these sort initiatives and who put a lot of time and effort which they do and you need your best people, you need enthusiastic lecturers. . . . (WBL Leader)

> as far as I can see so it's a personal interest and you know possibly I mean just they're talking about doing part-time courses for the unemployed or whatever at this stage so you know I would feel the Institute probably don't recognise, you know, give you credit for doing these sort of things, I mean there, you know, we can do them but nobody's going to say well done, you're not going to get time off from your lecturing to do these sort of things, so to a certain extent there is no advantage to doing this other than obviously for us we get contacts . . . (WBL Academic Practitioner)

> Well I think coming back to our last conversation I think it's a lucrative business for the Institute to get involved in. Now I'm sure there's politics involved in every aspect of this . . . and the way the economic climate is going I think the Institute should be more proactive in trying to arrange and run these courses because it's employment for the teaching staff here and the fact that I have to do this during my holidays is you know is a typical example of . . . you know I could be doing this during the full-time year if you have a contract they'd should be putting into your average day teaching hours so it means that's the only time used At the moment it is really down to the staff whether they volunteer to do this or not. (WBL Academic Practitioner)

According to the Head of the Institute, the Institute has mechanisms by which it tries to recognise all achievements in teaching, for example, through its excellence in teaching awards and by holding an annual event which celebrates teaching and learning generally. He suggested that unlike research which has an 'intrinsic' recognition system, for example, through the peer

review system of publications and as a "public commodity", the Institute's current recognition system require academic colleagues to put themselves forward for an award and some colleagues may be reluctant to do this. According to one participant it should be possible to develop a system to recognise WBL with industry:

> Well there's no metric. It's not that complicated to develop a metric but it doesn't exist or nor is it even recognised that there's a gap you know. So you should be able to say well okay I don't have ten publications in the last three years but I have this following thing and it's an equal you know . . . . (WBL Academic Practitioner)

A number of interviewees referred to a lack of 'visibility' for the activity:

> Because their (that is employers) staff are on leave as well too, vacation time it has to almost happen during the academic year. It is a big headache . . . . by and large we have done these things on the basis of goodwill. For example some of the XX Company modules people have delivered, let's say half a module, and have said look it's not worth . . . don't worry about it . . . you know . . . we chalk it down in a little black book somewhere but we've done it on the basis of goodwill. Now goodwill only gets you so far. And the problem with that, my main issue with that is, is that it's difficult then for visibility within the Institute to show that you're doing these things because they're not formally timetabled (WBL Leader)

Academic participants' perceptions surrounding a lack of institutional visibility for their engagement in WBL with industry is compounded by the fact that, as it is conducted outside of the main academic timetable, WBL lecturing hours do not appear on the Institute's computerised timetabling system.

6.8.2 Academic development

While a few participants referred to the positive role of the Institute's Learning & Teaching Unit which supports the development of learning and teaching and provides academic programmes around pedagogical issues, a number of WBL Leaders and Academic Practitioners believe WBL Academic Practitioners should be supported to:

- Return to industry on short sabbaticals;
- Attend industry conferences and submission of articles to industrial journals be given equal status to submission of articles to traditional academic peer reviewed journals;
- Academics should be encouraged to participate on relevant industry/professional body committees.

One WBL Leader said due to Institutional policy they were unable to pay a membership fee of a professional body for a WBL Academic Practitioner who was responsible for sourcing an industry client which generated income for the School. A WBL Academic Practitioner said they have inadequate access to online websites which they need. Industry is now subject to the influence of globalisation, increased competition, and technology and hence their sector is more complex and dynamic and it is challenging to maintain a current knowledge base:

> I'd be reading those things on an ongoing basis . . . one thing that I would like is to be able to have subscriptions to some of the online websites which I don't . . . . (WBL Academic Practitioner).

There was a very definite sense emanating from WBL practitioners that the Institute should be more proactive, innovative and flexible in respect of providing relevant professional development opportunities for academics engaging in WBL.

6.8.3 Institutional supports

WBL Leaders and Academic Practitioners expressed their dissatisfaction at the lack of supports in respect of:

- Marketing (in order to develop new industry clients) and or access to finance to develop the activity;
- Relationship management (relationship management in the context of developing new industry relationships and ongoing relationship management in respect of a particular programme and the contracting industry client)
- Project management in respect of budgetary issues, registrations, etc;
- Academic management surrounding the processing of assignments, examinations;
- Operational supports surrounding arrangements for lectures, for example difficulties around the booking of lecture rooms, ensuring that these rooms have been set up with information technology, catering, and photocopying support for handouts;
- Improving the central functional services provided by units such as human resources and finance.

WBL Leaders outlined how they need access to funds to support the development of WBL initiatives. The view was expressed that local institutional disciplinary units should be responsible for and accountable for financial management of budgets and any surpluses which they generate, but they should have autonomy in this area subject to adhering to institutional procedures. According to a WBL Leader (Science) there are no funds available locally to develop the activity and what is needed is access to a 'war chest' to support development. Another WBL Leader held a similar view adding that each local unit would also have to be fully accountable for how it utilised the budget:

> It would be a budget available for development purposes and fully accounted, fully transparent, probably signed off by .... (WBL Leader, Business)

Some WBL Leaders and Academic Practitioners expressed concern that the Institute's unit costing system did not take into account all the benefits of undertaking WBL activity such as developing relationships with industry and also gaining access to up-to-date equipment:

> The other area is in the area of costing where we are now being told there is a 25% overhead in cost and from a purely accounting perspective that's fine but the value that we get as a Department is not, it doesn't have just euro in value it has the interaction, it has how we can pull in, I mean we got more than three XXX (equipment) from YYY company over the last while, how do you do that, how do you gain that . . . . (WBL Leader, Engineering).

WBL Leaders and WBL Academic Practitioners with responsibility for the day-to-day management of a programme reported they have very little support in respect of relationship and project management:

> I suppose it's a fashionable item at this stage that research is unquestioned and I would see that things like, other areas, others types of interventions such as training, consultancy, enterprise work would be very much the poor relation but yet that is the area I would see as being, having best potential to bring in the finance to support what they do. Research is all very well but unless you have world class research any research you do is secondary, is second level. (WBL Leader, Business)

WBL Leaders and Academic Practitioners say they have virtually no administrative support:

> If you do set up an office, if we have to set up an office, to do a project with XX Company and there were you know a record was being kept it basically comes down to Name of Interviewee you know and keeping the files and you've gotten ask the question is that sensible and you know it's certainly not going to happen, you wouldn't pay me €100,000 a year for filing I can tell you if I was employing me I would say sorry this is a complete waste of your time. I would not employ me to do this I would regard it as a waste of money, a complete waste of money. I'd be having me do other things. (WBL Leader, Built Environment)

> Oh on your own definitely. If the overhead doesn't work you've no backup, you're trying to get somebody in IT, you've got to get a room, it's hard to get a room, there's no room dedicated to . . . your fighting for rooms, half a morning in one room, the afternoon somewhere else . . . getting labs open . . . Saturdays now is a problem . . . charge you for opening the building so we're trying to reorganise so it's not on a Saturday . . . that to me is a problem it should be a centralised . . . courses running what . . .between €70,000 to €100,000 for a course that's a lot of money and we've got a good reputation so I don't see why there isn't a central resource, like a room for example . . . and we should have facilities I don't see why I have to run around looking for a flip chart for half a day, we don't have one . . . markers . . . you know it's all those little . . . other places you go to . . . if I go to a conference or something . . . it's all there .. . everything's done . . .
>
> And the second thing is there should be a resource like a secretary or somebody who should take the names, why do I have to do the registrations, why do I have to do the exams, why do I have to . . . you know I have to prepare the exams, I don't mean prepare them, I don't get any allowance for . . . hours wise . . . I still do my full 16 hours and on top of this I to prepare their exams, I'm their point of contact . . . I get about at this stage 40, 50 calls a week or emails that I've to deal with . . . you know . . . I can't sit the exam today or next week because of different reasons . . . I don't know why I have to deal with all of this . . . it should be some central resource . . . ring up here, if you have any problems. The fact is if you have any problems you ring me and then I've to deal with all the problems and all the students and if anything goes wrong it's my fault so . . . but I've no budget either . . . (WBL Academic Practitioner)

Two Schools had availed of project management support from two units within the Institute and expressed satisfaction with this experience. WBL Leaders roles indicate they favour supports which were either based within their School or shared among a group of local Schools. A WBL Leader (Built Environment) that if a support unit is provided centrally this can be problematic in that the staff within the unit may effectively be reporting to both a local and a central manager and conflict may arise. While the views of those in leadership roles varied

as to how best they could be supported what was important to them was familiarity with the work of the School so they did not have to as one WBL Leader said 'rehearse' issues every time they liaise with key personnel. One WBL Leader said they also recommend that other support services such as human resources and finance have a key contact person for each School:

> So while there is a function for central services I think there should be a point of contact, there should be a person who's appointed if you like who literally walks the corridors, comes in to see the Head of School . . . who is familiar with what's happening, what the operation is, what the issues are, rather than me having to rehearse it every time when I get somebody else on the phone in HR, you know there's a change of personnel, there's a change in Finance or whatever it might be you've to explain the situation again to somebody who may not be familiar with the legacy of what happened in the past, who may not be familiar with what was set up etc. (WBL Leader, Science)

WBL Leaders and Academic Practitioners expressed dissatisfaction surrounding bureaucratic procedures, lack of familiarity with the nature of the work, and delays in respect of academic staff being paid and invoicing of the client company. One WBL Leader outlined how they have attempted to tackle the problem of payments to staff and invoicing:

> Yes and there's been a few sad situations where lecturers haven't got paid or by the time the invoice comes in the company are saying well when was that for and whatever. However we have worked with our Accounts here . . . and we now have a much more streamlined situation that at least we can account for it but we're still working on that though you know . . . . (WBL Leader)

> If we could cut out the bureaucracy but we can't we're stuck with it. But also even invoicing the company is an issue. The company wants to requisition straight away but that doesn't happen there's so many different people in the Institute and it sits on somebody's . . . desk in . . . and sent back . . . . (WBL Academic Practitioner)

Functional Leaders referred to an institutional initiative in development for a few years which it is hoped will provide a more flexible

administrative service to the academic community. While this initiative may eventually provide greater flexibility in respect of administrative services its development would need to take account the needs of the stakeholders in WBL with industry (the academics, the industry representatives, and the students) and also have an understanding of the important role of relationship building which has been identified as a key success factor in WBL partnerships.

6.9 The Workplace as a source of and site for learning – possibilities, constraints and costs

WBL Leaders and Academic Practitioners agree that while the workplace provides opportunities for the integration of work-based experiences into WBL programmes they had encountered situations where the workplace did not provide adequate or appropriate learning experiences for the students. In one instances, issues outside of the remit of the programme affected students' attitudes towards it.

A WBL Academic Practitioner outlined how the nature of work and or seniority of students/employees within organisations may vary and this can affect the quality of assignments which students produce.. This was not the fault of the student/employee:

> and the quality of work he was doing was you know just so quantum leaps ahead but yet this student here was doing as good as they could in that environment . . . how do you grade that . . . do you give this person higher marks because they happen to be in a more senior position and therefore . . . and that was a debate and I don't think it was ever resolved . . . .(WBL Academic Practitioner)

As was outlined earlier, in the case of one programme the issue of students/employees on an in-company programme taking an examination in respect of one particularly challenging module became contentious with the students/employees refusing to take the examination and the company unwilling to consider other assessment options. The WBL Academic Practitioners involved in the programme believes that as some more junior students/employees performed better on the earlier examinations this may have been a contributing factor in making the particular examination contentious:

> Another thing I think I suspect sometime in the end some senior staff got far worse marks than some of the junior staff. People who are working to people got better marks than the people who were supervising . . . .
>
> And I . . . a bit of me suspects that as well like some people who were highly regarded or who regarded themselves highly didn't do as well as they thought they could and they became very frightened over this other module which is probably the more rigorous of the . . . . (WBL Academic Practitioner)

This WBL Academic Practitioner suggested piloting the programme first with a smaller group might have helped avoid the situation (although there were other difficulties surrounding the programme which were internal to the company and outside of the remit of the School).

There is a need to address how intrinsic differences in roles and work environment which, through no fault of the stakeholders in a programme, may impact on the learning opportunities available to the student/employee. Perhaps promoting and supporting intra and inter-company co-operation around sharing learning opportunities might be explored as co-operation could contribute to the development of the sector. Although as one WBL

Academic Practitioner (Science) indicated co-operative learning provision among companies from the same sector is sometimes met with concern from employers that talented employees on a programme may be head hunted and move to a competitor.

Generally WBL Leaders and Academic Practitioners indicated they believe that top management commitment is essential for the success of WBL programmes:

> If it's seen as just another thing which you know HR has dreamed up it's dead in the water, so there's little things apart from making time available and obviously giving supports for it there's a lot of signals the organisation has to give showing that this is (a) a serious initiative and (b) one that they value. Many of the students or participants who have gone on the programme would have used this as a platform to bring themselves to the attention of senior management and also as a stepping stone for promotion. I think if they build in, if organisations build in this learning type habit as part of their culture well then, you know, they don't need to do an awful lot more. (WBL Leader, Business)

A WBL Practitioner (Business) said when students have positive engagement with managers when undertaking work-based learning assignments the quality of these assignments is enhanced:

> Mostly it's kind of mentoring and sometimes not even that you know they'd get an odd bit of help . . . I notice when the assignments come back sometimes you can see students have spoken with their managers, in some companies it's great and students get a great lot of help, others aren't so good and we try and encourage that because if they're not getting some kind of. . . because some students wouldn't have sat in a classroom or listened to a lecture for years, twenty, thirty years, some of them they find it very nerve racking, and we try and make the first module as simple, not simple in its content, but as stress free as possible for them, and if the companies are helping, if they're mentoring in the background, there's a backup in the company, it helps. (WBL Academic Practitioner, Business)

> Particularly for the company, yeah and it sort of . . .they see what they're getting you know it's what they're getting for their buck, their dollar and you're kind of . . . you find . . . I find that the companies who engage more are the ones that are actually better at this, their students seem to be better, their students would be more motivated, morale is high, they see the benefit to the company and they're always looking for the angle as to how we'd add value to the company you know . . . bottom line. (WBL Academic Practitioner, Business)

WBL Academic Practitioners (Business and Science) referred to the use of workplace mentors to support students/employees. WBL Academic Practitioners said while some training had been provided for mentors its provision is uneven and it is difficult to get mentors to attend at the Institute for training:

> Very hard to get these fellas to come in . . . it's genderless . . . it's male and female . . . it's very hard to get these fellas to come in and sit down and somebody to start talking education theory to them or whatever learning theory or learning mode and then it's more difficult even when they go back to the workplace to get them to do it right. It's a bit hit and miss with us. I'd be telling a lie. Now if you can get me somebody who'll put their hand on their heart and say that industry mentoring, you know, is a hundred per cent successful, I'd be a bit suspicious. (WBL Academic Practitioner, Business)

WBL Academic Practitioner reported that mentors are sometimes selected based on their willingness to undertake the role and not necessarily on the basis of their suitability for it. WBL Academic Practitioners indicated that students who are returning to learning need support and also some students/employees may need company support to access suitable work-based experiences. Participants commented that the roles of students/employees vary in respect of complexity and demands. The findings highlight the importance of the role of managers and mentors in supporting student/employee learning and the need to ensure all who are involved in the

programme, either directly or indirectly, understand the role they play and where appropriate, as in the case of company-based mentors, are encouraged to participate in programmes aimed at their own development.

WBL Leaders and Academic Practitioners reported there is anecdotal evidence to suggest that as a result of participation on a WBL programme participants are promoted. Through undertaking work-based projects participants may come to the attention of senior management and may be promoted. WBL learning presents challenges for practitioners. One WBL Leader said their role is to provide an education programme to students and not to measure whether it has resulted in improvements in employees' performance which he described as being 'something different'.

WBL Leaders and WBL Practitioners regularly referred to the demands on their time to develop understanding of, and relationships, with a company. WBL Academic Practitioners also outlined how in some cases a lack of time impacts on their ability to get to know students' strengths and weaknesses with this being particularly difficult with a short WBL programme. Time was also referred to as being necessary for students/employees in order for them to have opportunity to reflect on what they had learnt in the classroom and in the workplace. One WBL Practitioner observed that sometimes when they received feedback from students saying the material they delivered had been too theoretical when they explored the background of the student they often found the WBL programme was the student's first experience of higher education.

Some WBL Leaders and Academic Practitioners reported companies have better facilities for lectures than those which are available in the Institute. However, WBL Leaders and Academic Practitioners said aside from encouraging students to feel they are part of the Institute, for those who had never attended higher education before, having lectures in an academic setting supported the students' developing pride in, and confidence around, their participation in a higher education programme.

A few WBL Academic Practitioners suggested there should be greater use of online learning resources to support student learning. Currently usage tended to be limited, for example, to putting lecture notes online. Due to pressure on time, and also sometimes different geographic locations, it can be difficult for students to have interaction outside of their formal lectures. A WBL Academic Practitioner (Business) said on one programme said they believe they have been remiss in not arranging some social activities for the students.

6.10 Summary

The Institute's engagement in industry partnership is complex. Structurally there is variation in the types of partnerships with differences in the types of organisations, the size of organisations, the geographic spread of organisations, and in some cases, diversity among the types of employers who are members of the partnership. This structural variation in partnerships presents challenges for WBL Leaders and Academic Practitioners in respect of promoting and sustaining employer involvement and student learning.

Not only is partnership structurally complex but for a HEI with credentialising power, such as this Institute, involves engaging in collaboration with industry involving the co-operative sharing of resources, while still through its credentialising powers having ultimate responsibility for the quality of programmes. This responsibility necessitates the HEI retaining control and independence over key aspects of programme development and delivery which impact on the quality of student learning and hence the integrity of its awards systems.

While partnership involves collaboration and joint problem solving for the HEI it also involves sensitive negotiation and intervention in order to ensure students' learning is at the level appropriate to the particular programme. The workplace does not always provide suitable learning opportunities for students/employees and its capacity to do so may be constrained or limited due to the presence of issues outside of the WBL programme. On occasions workplace learning opportunities may be underdeveloped due to the quality of managerial or mentor support.

There is some evidence that while institutionally WBL with industry is encouraged that academically WBL Academic Practitioners still feel they have to defend WBL programmes as being of a comparable standard to other 'mainstream' programmes within the Institute. Greater availability of student supports, especially around return to learning type skills, such as study skills and writing assignments, would support student learning and reduce the

burden of responsibility on the WBL Academic Practitioners, who in some cases, are trying to support a diverse profile of students.

Much stress was placed on by WBL Leaders and Academic Practitioners that successful partnerships require the 'right' academic team. It was suggested the team should also include representatives from relevant support services in order to promote understanding, commitment and integration of the programme into the Institute's administrative systems. Academic team members need to have contemporary industry knowledge and be willing to engage with and ensure the engagement of employers, sometimes over several years. WBL with industry is challenging in terms of the demands it places on WBL Leaders and Academic Practitioners. The majority of WBL Leaders and Academic Practitioners have acquired considerable knowledge and skills in the area of partnering with industry. This knowledge and skill has been acquired through experience with some informal support from colleagues. While Academic Practitioners are enthusiastic about WBL partnerships with industry they have at times experienced difficulties which they feel they have had to resolve themselves. Participants do not appear to have received any formal training in the development and management of partnerships.

Much emphasis was placed on the efforts and resources required in order to engage in partnerships, such as, long term commitment, relationship building, active engagement with employers, and the supports required by the students and managers/mentors. While all participants are committed to WBL with industry there was a strong feeling among WBL Leaders and

Academic Practitioners that the activity is under-resourced and this is compounded by WBL Academic Leaders' and Academic Practitioners' perceptions that the Institute does not recognise their efforts.

PART III

Chapter 7

Discussion

7.1 Introduction

Chapters 2 and 3, the Contextual Review and the Literature Review, respectively formed the basis for the development of the conceptual framework. The conceptual framework highlighted how the academy's engagement in WBL with industry challenges its role in knowledge production and transmission and that higher education is under increasing pressure to meet the needs of the knowledge economy. Among the challenges which the literature outlines in respect of WBL are:

> Work-based learning interferes with academic protocols for knowledge production and transmission (Hager, 2000);
>
> Academic communities of practice have a strong commitment to academic protocols for knowledge production and transmission and while language/behaviour may change values may not (Henkel, 2000; Paterson, 2003; Bennich-Bjorkman, 2007).
>
> Academics feel vulnerable that their knowledge may be judged and found deficient by external knowledge producers (Boud and Symes, 2000);
>
> Meeting the needs of employers results in a commodification of knowledge (McIntyre and Solomon, 2000);
>
> Meeting the needs of employers may result in the exclusion of some of the educational needs of the students/employees (Casey, 2003)
>
> The service role of adult higher education is being transformed to a commercial activity (Einsiedel, 1998; Gustavs and Clegg, 2005);

While the WBL Academic Participants in this research did not present WBL as an unproblematic activity their main concerns, as outlined in the

findings, do not mirror the sorts of concerns as highlighted in the literature or are viewed as problems which could be addressed. WBL Academic Participants presented as being constrained from engaging in WBL and argue that by engaging in the activity they are supported to remain contemporaneous and close to practice. WBL Academic Participants strongly feel that their engagement in WBL does not get institutional recognition and challenges which the activity presents for their HEI could be ameliorated, according to the WBL Academic Participants, if institutional and industry-based recognition and supports were enhanced. There is therefore a sharp difference in emphasis between the beliefs of the WBL Academic Practitioners around engagement in WBL with industry and sources of tension which they experience and the concerns and tensions outlined in the literature.

It is argued that the dissonance between the concepts and concerns highlighted in the literature review and the findings in this research are suggestive of two issues. Firstly, the benefits of members of the academy engaging in WBL with industry may be an overlooked and under-researched aspect of WBL. Secondly, the WBL academic participants interviewed for this research study belong to an institution with a long tradition of engagement with industry and professional bodies but which now aspires to obtaining technological university status. The WBL Academic Participants' beliefs around the status and recognition of their engagement in WBL may be indicative of the complex operating environment of higher education institutions which are seeking university or technological university status. Research carried out by Boyd (2010) among newly appointed lecturers in

teacher and nurse education indicates that these newly appointed lecturers are anxious to remain connected to professional practice and experience tension over their role as lecturers preferring to retain their identity as practitioners. This may help to explain that while not discounting the challenges of engaging in WBL with industry, that the WBL Academic Participants due to biography and tradition, closely identify with industry as a source of contemporary knowledge in their field and wish to remain connected to practice. While originally European universities were providers of vocational education in law, theology and medicine, as the higher education sector evolved the HEI system itself, as in Ireland, became divided into elite, research intensive universities and other types of institutions, such as the institute of technology sector, which were viewed as providing more applied and vocational education (CEDEFOP, 2011). The university sector is vying to be seen as providing relevant programmes (Brennan, 2011) and other parts of the higher education sector, such as the institute of technology sector, are seeking to enhance their status due to increasing awareness of international rankings of higher educational institutions and are seeking university or technological university status.

The divergence between the issues highlighted in the literature review and the findings represent, it is argued, new dimensions to the field of WBL. The evolving role and structure of the HEI system itself , as it grapples with addressing new challenges and change, is perhaps exemplified by the experience of the WBL Academic Participants in this research as they experience the evolving role of their own institution, which for them is experienced as a reduction in the importance of an activity participation in

which supports the maintenance of their identity. Bennett & Kane (2009), who researched employer engagement practices of UK business schools and departments, commented that they could not source research on factors related to why universities engage with employers. The findings of this research are indicative of the complex HEI operating environment in which WBL is being undertaken and suggest that further research should be undertaken.

The remainder of this Chapter is divided into four sections with the key issues under discussion in each of the sections highlighted in bold. Section 7.2 discusses the implications of WBL Leaders' and Academic Practitioners' motivation to engage in WBL with industry as part of their professional development which they maintain enhances institutional curricula generally. Section 7.3 then considers the findings in respect of the influence of the biography of the academic participants and School tradition on their engagement in WBL with industry. It also considers the tensions which the findings suggest are present between institutional and School understandings of the contribution of WBL with industry to academic development. Section 7.4 discusses the opportunities, challenges and limitations which the findings suggest in respect of HEIs' engagement in WBL partnerships with industry. Finally, section 7.5 reflects on the opportunities, challenges, and limitations in respect of the workplace as a source of and site for WBL programmes.

7.2 For WBL Leaders and Academic Practitioners engaging in WBL curriculum development and delivery with industry is a mode of academic development which informs institutional curricula generally. The findings from this research study indicate academic involvement in WBL with industry is mainly undertaken as a reactive and voluntary activity. This raises questions in respect of the effectiveness of national and institutional strategies to support knowledge exchange with implications for workforce development.

The study highlights that WBL Leaders and Academic Practitioners engage with industry on WBL curriculum development and delivery as they argue this engagement provides them with access to contemporary knowledge which informs the development of curricula within their Schools. The study also shows how in some cases WBL Academic Practitioners rely on industry to provide them with access to up-to-date equipment and industry-based training. By collaborating, for example with industry on WBL initiatives, parties may accrue individual stakeholder benefits, but collaboration also has the potential to add value beyond individual stakeholder benefits (Smith and Betts, 2000). While some of the academic community may be reluctant to engage in WBL with industry due to concerns that their knowledge base may be threatened (Boud and Symes, 2000), the participants in this study, who have considerable experience in the area, are more concerned that their Institute enhances the conditions under which they engage in WBL with industry.

The emergence of mode 2 knowledge production wherein knowledge production is a transdisciplinary activity involving many stakeholders with an emphasis on the practical and tacit nature of knowledge (Gibbons et al, 1994)

has brought about significant changes in respect of both how knowledge is conceptualised and work is organised (Casey, 1999; Matthews and Candy, 1999). Knowledge is viewed as a commodity (Houlbrook, 2009). Organisations and governments recognise it is people who create new knowledge. The capacity of a nation's human resources to create new knowledge has focussed attention on human resource development. Organisations and government understand if its human resources do not have the capacity to develop new knowledge, or if key personnel leave an organisation, this reduces the capacity to compete (Brown, 1999; Matthews and Candy, 1999; Enterprise Strategy Group, 2004). For many years higher education has been called on both to ensure undergraduates acquire knowledge and skills which support their addressing complex problems in a fast paced environment and also to contribute to the ongoing development needs of the labour market (Teichler, 1999; Miron, 2008; Roodhouse, 2010a). More recently in Ireland due to the recession there has been renewed recognition of the role of Ireland's human resources in economic recovery and its importance in building a 'Smart Economy' (Department of the Taoiseach/Government of Ireland, 2008; Forfás, 2010; Government of Ireland, 2010).

WBL Leaders and WBL Academic Practitioners attach considerable importance to the role which they believe WBL with industry plays in academic development. However, according to participants the activity is primarily undertaken on a reactive basis with academic participation in WBL with industry voluntary. The emphasis which participants placed on their

belief that WBL with industry is a mode of academic development surprised me. It suggests while WBL Academic Practitioners may be concerned to gain from participation in WBL programmes (Gustavs and Clegg, 2005) their concern is based on accruing professional, rather than financial, benefits.

According to WBL Leaders and Academic Practitioners participating in WBL curriculum development and delivery with industry is a bridge from theory to practice. Their involvement provides them with access to new developments in their field and insights into practice. Ongoing involvement in WBL with industry avoids the struggle experienced by some academics of trying to break into the strong groups, language and behavioural norms of some industries (Kinman and Kinman, 2001). The literature on work-based learning tends to focus on challenges surrounding supporting students' learning such as developing students' ability to theorise practice and particularise theory ' (Slotte and Tynjala, 2003). It may be challenging for some academics to teach industry-based students. For example, it is difficult to separate propositional knowledge from practical know-how (Eraut, 1994; Eraut, 2001). Supporting students to codify what they may present as a list of processes resulting from their professional action may be an untidy teaching and learning experience for some academics. Students' experiences are unlikely to be neatly confined to disciplinary boundaries or presented as a sequentially and logically codified case study. The notion of WBL being transdisciplinary akin to mode 2 knowledge production (Gibbons et al, 1994; Lester and Costley, 2010), the situatedness of the learner in the workplace (Boud, 2001), and the challenge of meeting the codification requirements of

higher education make for a challenging work environment for the WBL Academic Practitioner. There was widespread recognition among WBL Academic Practitioners that involvement in WBL programmes with industry informs their practice. These WBL Practitioners presented as being comfortable with their multiple roles of facilitator, expert and academic consultant while also to some degree being a 'student' themselves (Lester and Costley, 2010).

Participants referred to two important concepts. Firstly, the notion of being kept up to date with new developments in their field. Secondly, the notion of acquiring knowledge of practice. As referred to in Chapter 5, academic participants indicated they wish to engage in WBL with industry in order to access contemporary knowledge and to remain connected to practice, and their concern is around being facilitated to do so. This is important and is subtly different to academic participants having presented arguments around deficiencies in academic constructions of knowledge or that industry's construction of knowledge is superior. Very simply academic participants indicated that they want timely access to contemporary developments in industry and exposure to practice. It is worth noting here that further research is required in order to unpick WBL academic participants' construction of contemporary knowledge and whether there are disciplinary differences in its construction.

Functional leaders consider it is 'inherent' in the role of an academic that they remain contemporaneous. Some WBL academic practitioners believe

traditional modes of academic development are either insufficient or, as outlined by one WBL Academic Practitioner in the case of academic publications, not available in a timely fashion. It is argued that how academics are supported to remain contemporaneous requires not just appreciation of how new knowledge is produced and applied but importantly considers whether current modes of academic development facilitate knowledge exchange from industry to higher education. Research suggests the academic community is favourably disposed towards collaborative academic development as an important and preferred mode of academic development (Ferman, 2010). However, collaborative development with external non-academic partners as a mode of academic development outside of research activity does not appear to feature greatly in the literature on academic development. Ironically while academics themselves may be given autonomy for the choices they make in respect of their development this autonomy may reduce the responsibility of their institutions to either monitor or provide conditions of employment which support their development.

Fowler Davis suggests that HEIs confront "a range of competing priorities, in relation to academic workload, income generation and academic credibility alongside any energy or vision to become enterprising" (Fowler Davis, 2009, p. 683). Involvement in 'enterprise' activity, such as continuing professional development, is sometimes considered less 'relevant' in comparison to research. In the United Kingdom the Research Assessment Exercise (RAE) is seen as a driving force for research activity with financial and reputational incentives (Fowler Davis, 2009). Discussion is taking place surrounding

knowledge exchange and the funding of third stream activity (Innovative Research Universities Australia Discussion Paper, 2005; Public & Corporate Economic Consultants and the Centre for Business Research, University of Cambridge, 2010). However, the potential value of knowledge exchange through engagement in WBL curriculum development and delivery with industry is, I would argue, underexploited. Unless WBL with industry is recognised as an institutional priority, when individual (academic) employees leave the activity, the HEI's relationships with an employer can be vulnerable (Higher Education Academy, 2006). Some WBL Leaders and Academic Practitioners believe their Institute's recruitment policy has shifted from a focus on recruiting experienced industry practitioners to recruiting 'career academics'. During the course of interviews participants indicated they believe the work they do in the field of WBL goes unrecognised and does not get the same status as research. It is interesting that the recent *National Strategy for Higher Education 2030* (Report of the Strategy Group January, 2011) recommends greater inward and outward staff mobility between HEIs and wider society. However bearing mind the financial pressures on higher education with a moratorium on recruitment it may be challenging to do this. Perhaps any income generated from WBL with industry should be utilised to fund those who engage in the activity to take placements in industry or to undertake research in the field.

Outside of Ireland, promotion of WBL has found to be strongest among institutes with a 'pragmatic outlook' and especially among former polytechnics in the United Kingdom or in the former institutes of technology in Australia which, compared to the universities, have promoted closer links

with industry (Boud and Symes, 2000). The Irish government's Strategic Innovation Fund (SIF) is providing investment to HEIs to enable them "to meet the challenges presented by the changing social and economic realities while building on their existing strengths" (Education in Employment, SIF, 2008, p.3). Over twenty years ago McFarlane commented that the advent of the knowledge and learning society implied the greatest portion of post-compulsory education would take place in work (McFarlane, 1998). Functional Leaders referred to the pressure on the Institute's resources and to the lack of a national funding policy which would support the capacity of the Institute to enhance its delivery of WBL programmes with industry. What is needed is a coherent and consistent policy of investment at national level in order to ensure higher education can contribute to workforce development and has staff with the necessary skills to do so while it also fulfils its traditional teaching provision to undergraduates (Eyres et al, 2008).

While there is extensive literature on work-based learning it is difficult to source literature which has examined work-based learning from the perspective of developments in Ireland. There are signs this is changing and a recent study of work-based learning (which was funded under SIF), Work-based Learning Graduating Through the Workplace, 2008, used case studies based on a number of Irish HEIs establishing a partnership as part of the project. There is a need for on-going research and dissemination around the different types of relationships HEIs form with industry, how these relationships develop and their impact on the curriculum. Sectoral approaches to learning open up opportunities for

access and progression for all employees and are especially important to sectors that may not traditionally have had relationships with higher education (Challis, 2007).

Having the different types of WBL engagement with industry embedded in different Schools avoids the fragility of commitment to the activity when it is located in a separate institutional unit (Gustavs and Clegg, 2005). However, the absence of permanent institutional structures to support cross School sharing of practice does limits opportunities for sharing practice. Boud and Solomon (2001) have outlined the reason for the gap between WBL and collaborative research as being structural, that is, WBL is part of teaching and learning and research is located in the areas of research and consultancy.

7.3. The findings indicate the biography of academic participants and/or their School/Department tradition influence academic practitioners' engagement in WBL with industry and its location as part of their School/Department service function. There is evidence of difference and tension between institutional and School understandings of the contribution of WBL with industry to academic development. Pressure on institutional finances suggest WBL with industry may be reconceptualised as an income generator

This section discusses the role of biography and school tradition in promoting WBL Academic Practitioners' engagement in WBL curriculum development and delivery with industry and also its role in academic conceptualisations of service. The study indicates there are tensions and pressures surrounding academic participants and institutional perceptions on the role of WBL with industry.

7.3.1 The role of biography and school tradition on WBL Academic Practitioners' engagement in WBL with industry and tensions between School and institutional perceptions around the role and recognition of engagement

As outlined in the findings and analysis the study found the majority of WBL Leaders and Academic Practitioners have early career experience of working in industry, and joined Schools which already had close association with industry and engagement in part-time education. Despite the fact that for the majority of these WBL Leaders and Academic Practitioners it has been many years since they worked in industry their early career experience in industry continues to influence their desire to remain connected with industry. This study did not set out to research the career choices of academics on joining a higher educational institute. So the findings are limited to what has motivated these particular WBL Leaders and Academic Practitioners to engage in WBL with industry. It could be argued that this particular group of WBL Academic Practitioners may, in different circumstances, have followed different career paths. Despite this limitation the study does indicate that among the WBL Academic Practitioners there is confluence between an area they are interested in and an activity their School wishes to engage in.

On joining their Schools WBL Academic Practitioners were facilitated to continue their interest in remaining close to practice and may have avoided a diminution of their identity, or feelings of conflict, which some professionals experience on joining HEIs as novices in an academic world (Shreeve, 2011). Research has shown that the early career experience of probationary lecturers, which is under-researched, influences the identity formation of lecturers, that the influences of the department are

'fundamental' to its formation, and early career experience of lecturers can vary within the same institution (Smith, 2010).

It has been argued that when considering issues around academic development "allegiance to professional bodies in conjunction with the weight academics give to being knowledgeable and up-to-date in their subject area can significantly influence their approaches to academic development" (Crawford, 2010, p.193). It was found that an institution's historical context was less important in respect of its influence on professional development than professional background. However, institutional context was relevant in respect of how institutions respond to academic development needs in terms of setting values and priorities (Crawford, 2010, pp. 198-199). This study shows how WBL Academic Practitioners are facilitated at local School level with continuing their connections with practice and any dissonance that exists relates to WBL Leaders' and Academic Practitioners' beliefs that institutionally their efforts go unrecognised. One WBL Practitioner pointed to the failure of the Institute to develop more inclusive metrics for scholarly output which would recognise the work of WBL Academic Practitioners.

Defining what academic development is has been described as problematic (Macdonald, 2002). In respect of academic practice which relates to teaching there is now a scholarship of teaching which has grown not only in terms of its popularity (Kreber, 2005) but also in respect of approach, that is, the development of generic teaching and learning programmes which are

particularly aimed at newly recruited academics (Healey and Jenkins, 2002). In the Institute where this research study was undertaken there is such a generic programme which is mandatory for newly recruited academics. There is recognition that "disciplinary differences are evident at the very beginning of an academic career" with professionals who join academic institutions having worked as practitioners for a number of years and may not possess a PhD. Academics in the 'pure' subjects areas are required to obtain a PhD and are concerned with the prestige of Departments and Institutions they are associated with (Becher and Trowler, 2001). There is also a growing recognition of disciplinary differences in respect of academic development needs (Healey and Jenkins, 2002). While there is a place for generic programmes to support academic development this study suggests that institutional academic development planning should take into account that different disciplines may have different development needs and that individual academics will make different choices in respect of their careers. Depending on their career path academics within the same discipline and School may have different development needs. In the UK research has found there is a disconnection between the issues which academics perceive as important to their careers and human resource discourses (Strike and Taylor, 2009). Becher and Trowler observe "a common finding of studies of what motivates academic researchers that what moves them is primarily factors intrinsic to the discipline itself, particularly the desire to develop a reputation in the field and to contribute significantly to it" (Becher and Trowler, 2001, p.75).

Academics are part of disciplines based in a unit, the department, there is potential for tension between the local departmental and the more distant institutional influences on identity formation (Henkel, 2000). Some professionals who join HEIs wish to continue their association with professional practice, but this can reduce the time available for research and continuing professional education (Eraut, 1994). This study suggests that what 'moves' WBL Academic Practitioners are initiatives which support their remaining close to their sectors and/or professions with this proximity to practice sustaining their identity and their feelings of credibility with their industry. There are calls for HEIs to reconsider approaches to teaching, curriculum and assessment in light of changes in knowledge production and the organisation of work (Boulton-Lewis, Pillay and Wilss, 2006). This study indicates there is a deficit in respect of understanding of the development needs of WBL Academic Practitioners. There is a need to listen to and research the 'voices from below', that is, the voices of WBL Academic Practitioners (Crawford, 2010). Considering the mature profile of many participants in this study, if higher education's engagement in WBL with industry is a national and institutional priority, then steps need to be taken to ensure there is an adequate supply of academics interested in, and supported to, undertake such work.

7.3.2 Pressure on institutional finances suggest that WBL with industry as part of a School/Institutional service role may be reconceptualised as a potential income generator.

This study found that aside from a desire to continue their connection with industry as a mode of academic development to inform the curriculum, among academic participants there was also a keen sense of serving the needs

of the members of their profession and/or part-time students, especially alumni. Further WBL Leaders and Academic Practitioners demonstrate a good deal of empathy with the needs of part-time students and are especially concerned that students attending higher education for the first time are provided with appropriate supports. Indeed there is a sense emanating from WBL Leaders that currently part-time students, who in this case happen to be part of a programme initiated and funded by their employer, do not receive the same level of support services provided to full-time students. WBL Leaders and Academic Practitioners understand that apart from the demands of being a student, WBL students have many other demands on their time.

While it has been argued that the service role of adult higher education is being transformed to a commercial activity (Einsiedel, 1998; Gustavs and Clegg, 2005) the study shows WBL/Leaders and WBL Academic Practitioners primary motivation to engage in this activity is around academic development to inform the curriculum and to serve the needs of their profession/alumni or industry. A few participants alluded to the potential of WBL with industry to generate additional income and Functional Leaders also referred to the pressure on the Institute's finances. WBL Leaders and WBL Practitioners regularly referred to the demands on their time to develop understanding of and relationships with a company. WBL is not an inexpensive way to deliver education (Boud, 2006). The Conference Report of the proceedings of the Roadmap for Employment – Academic Partnerships (REAP) called for improvements in the Irish funding model for part-time education in order to address inequities in the system. It also invited debate

around issues such as the development of appropriate and sustainable mechanisms to fund continuing education initiatives with industry (REAP Report of Conference Proceedings, 2010). This research study suggests any additional income generated from WBL with industry should be reinvested in supporting the enhancement of services provided to students on WBL programmes. Also when considering the costs and potential for income what also needs to be taken into account are the unmeasured benefits around knowledge exchange to inform the curriculum, other resources supplied by industry, such as equipment and access to industry training provided by industry to some Schools, and the enhancement of the Institute's reputation to prospective students and employers.

Pressure on higher education's finances, resulting in HEIs' engagement with industry being motivated by its potential to provide HEIs with additional income, causes some to be concerned about the closer relationships developing between employers and HEIs, as it is argued, this may result in the commodification of knowledge (McIntyre and Solomon, 2000) . However, unless WBL with industry is seen not just in terms of the benefits to stakeholders but also where or whether it fits in with what has been described as the confused concept of higher education's public service role (Thompson, 2000), then it is argued its potential to support access to higher education may be underexploited. Some argue that WBL with industry has the potential to allow both economic and social justice considerations to co-exist (Braham and Pickering, 2007). In the United Kingdom the Higher Education Funding Council for England (Hefce) has provided Middlesex University's Institute

for Work-based Learning with £8m to support Middlesex's WBL initiatives. The WBL initiatives undertaken by Middlesex University promote employer engagement, access to education, and the WBL initiatives cost 10-15% less than traditional on-campus programmes (Roodhouse, 2010b). Introducing innovative funding models which promote, recognise and sustain the role and contributions of co-operative industry and higher education partnerships, might it is suggested, provide an efficient and effective model of access to higher education.

7.4 The experience of WBL Leaders and Academic Practitioners indicates there are opportunities, challenges and limitations to WBL partnerships with industry

This section discusses the opportunities, challenges and limitations which WBL partnerships with industry present.

7.4.1 Opportunities

Some of the opportunities which partnerships with industry facilitate, which were outlined by WBL Leaders and Academic Practitioners, such as academic access to contemporary knowledge and practice, academic access to industry training, the provision by industry of equipment, the provision by industry of facilities for programme delivery, and as a mechanism to providing continuing professional development opportunities to industry based students, have already been discussed and are not repeated here.

However, aside from the aforementioned benefits of partnership, this study shows the potential these relationships have to co-operatively develop and deliver WBL programmes by higher education and industry sharing

resources. In some instances due to inadequate resources within the Institute, WBL programmes could not proceed without the contribution by the industry partner to the programme. WBL with industry facilitates the effective deployment and development of higher education's intellectual capital (Garnett, 2001; Garnett, Workman, Beadsmoore and Bezencenet, 2008). Research indicates that there are benefits for WBL programmes and the workplace in taking employer resources and expertise from the workplace 'over the boundary' of the academy, and then back out into the workplace (Evans et al, 2010). This is not to say that partnerships are unproblematic. The risks and problems of strategic alliances between higher education and corporations include cultural differences, differences in objectives, external factors, such as organisational restructuring, and other important issues such as a breakdown in trust (Elmuti, Abebe, and Nicolosi, 2005). Nor is it to say that developing partnerships are easy or unproblematic even for those who are enthusiastic about them. According to WBL Leaders and Academic Practitioners developing partnerships with industry requires commitment to developing a relationship over time and sustaining successful relationships with employers requires constant communication with industry partners (Banim and Evans, 2008). WBL Leaders and Academic Practitioners presented their relationships with industry as being a relationship with a partner working on a joint endeavour and as being willing to learn and use the language of the partner organisation (Sutz, 1997). While as outlined by participants, partnership does presents challenges and demands, such as having the right academic team and the time involved in relationship building, there was no sense that

participants experience insecurity around their academic identity (Boud and Symes, 2000) or of participants feeling vulnerable having to operate within the different cultural gates of an employer as suggested by Kinman and Kinman (2000).

Apart from partnerships providing partners with opportunities to effectively deploy and develop their intellectual capital, this study was interesting in the emphasis which WBL Leaders and Academic Practitioners placed on relationships within the context of developing a specific WBL programme and also within the context of developing external networks. I was struck by the importance and value which participants placed on developing external relationships. It appeared to me that these participants readily desire to be part of many communities of practice both internally and externally. Recent research on university, business and knowledge exchange found while there are "multiple knowledge exchange mechanisms and our work has again stressed the importance of personal relationships of mutual trust built up over time. Our cases highlight the importance of relational rather than contractual interactions" (Abreu, Grinevich, Hughes, Kitson and Ternouth, 2008, p.5). A limitation of this study is it researched the experience of WBL with industry from the perspective of the academic community. It would be helpful to understand the workings of these WBL communities of practice from the perspective of all stakeholders. While I have deliberately used the term 'WBL community of practice' it would also be interesting to explore whether there would be acceptance of this term as it relates to the collaborations between academics and those external to the academic community and also to

explore the potential of these WBL communities of practice to develop other initiatives within industry and higher education.

7.4.2 Challenges of WBL partnerships

This study highlights two important challenges of WBL partnerships. The first challenge relates to how WBL with industry requires the 'right' academic team. The second challenge relates to how WBL Leaders and Academic Practitioners confront challenges from within the academy in respect of developing understanding among colleagues that WBL programmes have to meet the same academic standards as on-campus programmes and are therefore of equal status.

In developing a WBL curriculum, especially when it involves a new client company, the study indicates WBL Leaders need to have what they describe as the 'right' academic team. For WBL Leaders, WBL academic team members need to possess not just contemporary knowledge of the industry and of practice but also possess other personal qualities such as a willingness to listen, learn and accept feedback. Members of the WBL academic team perceive working with industry representatives as contributing to their own professional development. In essence these WBL Academic Practitioners contribute to and gain from the experience of WBL curriculum development. Involvement in WBL curriculum development also involves skilfully and sensitively informing, and to a degree, 'selling' the benefits of developing WBL programmes within academic frameworks for ultimate accreditation. While employers are attracted to the idea of accreditation they are not always prepared for the amount of work which needs to be completed to prepare a

programme for accreditation. Sometimes existing in-company programmes, which an employer wishes to have integrated into a WBL programme, do not meet the academic standards required by HEIs. WBL Leaders and Academic Practitioners expressed similar views around the amount of time and effort it took in order to develop a new WBL programme. Research has found that the time taken to initially scope a WBL programme is important for the future success of programmes (Costley, 2001). The findings suggest, that the professional and interpersonal skills of academic team members who are developing a WBL programme with industry, are possibly of equal importance in terms of ensuring successful collaborative relationships with non-academic team members who are also involved in its development.

The second challenge relates to how WBL Leaders and Academic Practitioners confront challenges from within the academy in respect of developing understanding among colleagues that WBL programmes have to meet the same academic standards as on-campus programmes and are therefore of equal status. WBL Leaders were keen to stress that WBL programmes follow the same academic processes and have to meet the same academic standards. The inclusion of 'unconventional knowledge content' (Costley, 2007) and the involvement of non-academics in WBL curriculum development may cause disquiet or discomfort for some, but for those directly involved in the process, and interviewed as part of this study, of greater concern were issues around developing, supporting and recognising the work undertaken by WBL Leaders and Academic Practitioners.

Emanating from participants was a sense of having to defend WBL programmes as being of an equivalent standard to other programmes especially full-time on-campus programmes. It may be that perceptions around WBL and vocational/training are a result of assumptions around "any learning in the workplace is often assumed to be 'training' and the category of work-based learning is seen to be homogenous" (Walsh, 2008, p.9). While providing students with work placements is considered to be an important component of 'mainstream' undergraduate programmes and a long established tradition in higher education and the training of professionals (Walsh, 2008), WBL programmes undertaken with employers reshapes the face of curriculum development. Employers are no longer invited guests selected by higher education to participate as part of a consultation process but are influencers and contributors to curriculum development. This form of knowledge production challenges the traditional autonomy of the university that it is the best judge of society's 'cognitive requirements' (Delanty, 2001).

This study indicates there is still a tendency to compare students against each other, that is, full-time versus part-time, and to need to make a case for the part-time student in respect of their ability to achieve high levels of learning of equal status to full-time students. Other studies also suggest that higher education still has "not fully grasped the characteristics and potential of work-based programmes and were treating them as traditional courses with conventional full-time student cohorts" (McCracken, 2010, 32). Research indicates that over 70% of learning comes from experiences which are either planned or unplanned which it is argued underscores the importance of

learning from 'real work'. However, "from an academic perspective" work-based learning continues to have to justify itself as being equal in terms of the quality of learning derived from participation on a 'mainstream' on-campus and generally full-time programme (Higher Education Academy, 2006, p.22). Concerns are expressed in the literature around the vocationalising of higher education, for example, the greater use of occupational standards and " the achievement of behavioural outcomes based on occupational standards", (Gibbs and Morris, 2001, p.84). However, this research study highlights that academic participants in this research, who stressed that students on WBL programmes have to meet the same academic standards as on-campus students, were more focussed on, and concerned about, enhancing supports for WBL students in order that these students are enabled to meet the higher educational standards required by their programme.

7.4.3 Limitations

The relational aspects of the partnership are presented by participants as key to developing and sustaining the partnership. Some argue that during the course of WBL partnerships with employers, organisations consider the academic as 'one of them' and the academic becomes subject to the rules of the external organisation (Boud and Solomon, 2000). When presenting as having positive relationships with industry representatives WBL Leaders and Academic Practitioners did not appear to have gone over to the side of the employer. However, there is a social aspect to developing relationships within a partnership, or to express it more simply, people within the partnership got on well together. A few WBL Academic Practitioners,

perhaps due to their inexperience in the area of WBL partnership, outlined situations which were a little awkward for them when an employer representative requested information which they recognised was not within their remit to provide. On a human level this creates embarrassment for those concerned. Irving (2008) has proposed some guidelines around organising assessment in WBL projects. It would be useful if the Institute developed 'Good Practice Guides' around Partnerships which outlined and defined roles and responsibilities. In the context of maintaining positive relationships within a partnership, these Good Practice Guides would act as a neutral and independent reference point/arbiter. Also, it is important to provide adequate staff development opportunities and briefings for both academic practitioners and company personnel (Onyx, 2001) who support the development and delivery of WBL programmes with employers while recognising the different roles and responsibilities of stakeholders.

7.5 The experience of WBL Leaders and Academic Practitioners indicates there are opportunities, challenges and limitations in respect of the workplace as a source of and site for WBL programmes

This section discusses the opportunities, challenges and limitations of the workplace as a source of and site for WBL programmes.

7.5.1 Opportunities

In Ireland both prior to the recession and now during the recession, the importance of having a well educated and skilled workforce has been emphasised (Enterprise Strategy Group, 2004; Government of Ireland, 2010). However, the advent of the recession in 2008 has brought high levels of

unemployment in Ireland with resultant fiscal pressures on employers and government. As discussed in the previous section, while WBL partnerships are not an inexpensive way to develop and deliver higher educational programmes it has been suggested that they are possibly less expensive than on-campus programmes. WBL partnerships, particularly those which are sustained over a number of years, are likely to be cost effective vehicles to develop and deliver programmes to employers. This suggests the effort which both employers and higher education make to build WBL partnerships, and which results in long lasting relationships, may be a cost effective way to develop and deliver higher educational programmes.

Employers may be mainly concerned to engage in education and training initiatives which promote organisational development. However, it was clear from participants in this study that some of the employees who have participated on programmes under the auspices of a WBL partnership were attending higher education for the first time. The Institute has participated in a number of sectoral WBL initiatives and these sectoral approaches to learning open up opportunities for access and progression for all employees and are especially important to sectors that may not traditionally have had relationships with higher education (Challis, 2007).

Two interesting points in respect of the curriculum were made in the study and are worth mentioning again. Firstly, WBL Leaders appreciated being able to respond to the specific industry requirements of a programme. As one

WBL Leader pointed out currently when developing a programme, for example a three year undergraduate programme, there is a degree of uncertainty as the academic programme developers are attempting to design a programme several years before the students who participate on it enter the workforce. In contrast when working very closely with an individual company or even a group of companies there is very close collaboration around the programme content and it is easier to tailor it to the needs of an industry sector. Secondly, in at least one School there is significant use of modules from existing programmes. These existing modules are then customised sometimes using company materials, case studies, and company based specialists to deliver material. By closely collaborating, higher education and employers are provided with opportunities which maximise the usage of existing programme frameworks and modules while allowing for customisation. These two points suggest that existing modules developed by the Institute have a high degree of relevance to the needs of employers. Integrating company or sectoral specific resources with existing educational frameworks and modules enhances their relevance for a company and maximises the use of existing higher educational resources.

7.5.2 Challenges

The findings indicate the success of WBL programmes is a dependent on a number of key issues related to top management commitment, the quality of the supports available in the workplace as well as issues related to the individual student/employee such as their educational profile and their role

within their organisation. These issues are discussed in the paragraphs below.

The study highlights the importance of having the commitment and involvement of key company personnel who are either directly or indirectly involved in WBL programmes, that is, senior managers, company-based mentors and company-based managers/supervisors. WBL Academic Practitioner reported that mentors are sometimes selected based on their willingness to undertake the role and not necessarily on the basis of their suitability for it. The research also found that the training of mentors appears to be patchy, with managers having difficulty finding time to participate in development opportunities. It is recognised that the roles of those involved in work-based learning will require a willingness to change and to acquire new knowledge and skills. The training of mentors provides another an opportunity for HEIs to engage with employers (Brennan and Little, 2006). The development of mentors requires more than simply the provision of a training course but should also include looking at issues around recognising, supporting and rewarding the role they play in supporting work-based learning (Minton, 2010).

In the experience of WBL Leaders and Academic Practitioners WBL programmes are more successful for all stakeholders when they are driven by senior managers and are not, as in the words of one WBL Leader, perceived by either participants or local managers as an initiative 'dreamed up' by HR. WBL can result in positive benefits for employers and employees (Nixon,

2008) but, as outlined earlier, WBL is not an inexpensive way to deliver education (Boud 2006). However it has also been found that often organisations have not "organised themselves sufficiently to gain maximum benefit from their employees learning" (Costley 2001, p.59). From an employer's perspective, and for a relatively low investment, an employer may derive significant organisational benefits (Johnson, 2001). In order for employers to derive benefit from their employees' participation on a WBL programme the findings suggest employers need to develop initiatives and supports in the workplace.

Research has found that students' prior experience of higher education impacts on the quality of their experience on a WBL programme (Rhodes and Shiel, 2007). In this study WBL Academic Practitioners reported that students who are returning to learning need support. Some students may need company support to access suitable work based experiences. One WBL Practitioner observed that sometimes they receive feedback that the material delivered in the classroom had been too theoretical. However, on exploring the background of the student the WBL Academic Practitioner often found the WBL programme was the student's first experience of higher education. Some students expect to have a learning experience where the lecturer provides very structured lectures and notes and experience difficulty handling the uncertainty and demands when more abstract concepts are introduced (Kinman and Kinman, 2000; Harvey, 2007). WBL Leaders and WBL Academic Practitioners said often companies had better facilities for lectures than those which are available in the Institute. However, WBL

Leaders and Academic Practitioners said aside from encouraging students to feel they are part of the Institute, for those who had never attended higher education before, having lectures in an academic setting supported the students' developing confidence around their participation on a higher education programme.

A WBL Leader (Built Environment) and Academic Practitioners (Built Environment and Business) commented that within organisations the role of employees who are participating on the same WBL programme may vary in respect of its complexity and demands. This can pose problems for some students as they may not have access to learning opportunities in the workplace which are appropriate to the WBL programme they are undertaking. This can cause difficulties in respect of fairly assessing students' work if it is felt that an unquantifiable and inequitable element has been present in the assessment process. Indeed research undertaken has demonstrated that to improve opportunities for workplace learning requires greater understanding and "focus on a range of organisational, cultural, pedagogical and job design factors that contribute to the quality of the learning environment" (Fuller, Munro and Rainbird, 2004, p.303; Fuller and Unwin, 2004). Aside from having the support of academic staff it has been argued a key source of support for learning is the support which is available in the workplace from mentors, managers and work colleagues (Lyons and Young, 2008). This research highlights the importance of their role in supporting student learning and the need to ensure all involved, either directly or indirectly, understand the role they play and where appropriate, as

in the case of company-based mentors, are encouraged to participate in programmes aimed at their development.

7.5.3 Limitations

The findings suggest that WBL programmes benefit from clearer delineation around roles and responsibilities.

Firstly, the academic community has significant expertise in respect of the recruitment of students and the demands which will be placed on students when they join a WBL programme. Maintaining the traditional line of communication, that is, (prospective) student to lecturer (Barnett, 1994) would enhance students' understanding of what will be expected of them on a programme and their preparedness to undertake it. For example, students' personal circumstances or lack of previous experience of participation in higher education may result, as was outlined by some WBL Academic Practitioners, in a more stressful experience for them and also place an additional burden on the WBL Academic Practitioners to support these students. The research suggests that prior to admission to a programme potential students would benefit from direct communication from the academics familiar with the WBL programme. This is not to suggest the sponsoring employer is not involved in employee selection for application to a programme, but it is the HEI which is responsible for assessing students' suitability for admission to it.

Secondly, as the study outlined the Institute's academic staff develops close relationships with industry personnel. A few awkward situations were reported where industry personnel sought information in respect of student results. In order to avoid these situations occurring and the resultant embarrassment for all concerned it would be useful if a 'Good Practice Guide' was produced which set out the roles and responsibilities of the Institute, the employer, and the student/employees. This Guide would also be useful for members of the academic community participating in a WBL partnership initiative for the first time.

The findings suggests there are appropriate limits to the role which an external partner organisation may have in a WBL partnership with a HEI in respect of issues which impact on HEIs' responsibility to maintain the quality of its programmes, as well as the integrity of policies and systems which HEIs deploy to effect this.

Chapter 8

Conclusions

8.1 Introduction

This Chapter outlines the contribution of the research study to knowledge, the limitations of the research, makes suggestions in respect of further areas for research, and finally makes recommendations in respect of policy and practice.

8.2 The research study – on endings and beginnings

As the choreographer researcher (Janesick, 2003) attempting to progress from an initial concept to the completion of a coherent piece of research presented in the form of text, which in this instance is in the form of a doctoral thesis and therefore follows the universal path of the research process (Dunne, Pryor and Yates, 2005), I encountered challenges which are outlined below.

At the outset of this research Ireland was still ostensibly the country with the 'Celtic tiger' economy. Now Ireland is in recession with high unemployment and a return to emigration. At the outset of this research I was working in the field of WBL acting as an intermediary between academic colleagues and industry. Now due to organisational restructuring in the Institute I no longer work in the field of WBL. Singh's (2007) comments that higher education is subject to many forces which demand both change and stability resonated me as I experienced and observed the many changes which occurred during the

period of this study in the Institute, in higher education generally, and in the external environment.

During the course of conducting the research, and as advocated (Miles and Huberman, 1994; Creswell, 1998; Eisenhart and DeHaan, 2005), I attempted to undertake a piece of research which was guided by principles of best research practice. As an insider researcher I was concerned, due to either preconceptions or familiarity, to ensure that during analysis I make the familiar strange (Hockey, 1993). Even as I moved to conclude the study, and had become more aware of the 'virtues and vices' of educational research and researchers (Pring, 2003) the production of this text was not the neat packaging phase I might have liked it to be, but was also part of the research process involving revisits and reconsiderations of the contextual review, the literature review, the findings and the research questions. So the production of this text was by no means a simple 'mopping up' phase but part of the research process (Richardson, 2003).

8.3 Contribution to knowledge

This research study began as a result of my experience in and observations around what it might be argued are local or minor issues only of importance to some of my academic colleagues or the Institute in which we are based. Through the research study I collected data around the motivation and experiences of a group of academics who are employed in one of the largest publicly funded HEIs in Ireland. Between them these academic participants have approximately 308 years experience of working in higher education.

Connecting the data generated from this research study into a broader discussion around WBL which was undertaken in Chapter 7, the Discussion, demonstrates that participants' stories are not only of importance to their own Institute and other HEIs but are also of importance to the economy and society. As outlined in Chapter 2, the Contextual Review, animating government reports are calls that higher education is more flexible, responsive and efficient in respect of its development and delivery of higher education. The local stories of a group of WBL Leaders, Academic Practitioners and Functional Leaders demonstrate that HEIs are not unwilling to engage in WBL with industry, and indeed, the WBL Leaders and Academic Practitioners in this research study want to engage in it. According to Functional Leaders, nationally HEIs need to be enabled to develop an operating environment which lends itself to the provision of a coherent and consistent service to industry. This is challenging to do, as for many HEIs WBL with employers is just one activity among a growing number of demands and pressures on their resources.

The experience of participants in this research study demonstrates there is still some way to go in order that HEIs can actively engage in, integrate, and recognise WBL curriculum development and delivery with employers as a mainstream higher educational activity. Participants' accounts of their motivation to engage in WBL with industry highlights the voices of a group of ordinary academics who are motivated and interested in engaging in WBL. Their motivation to engage in WBL with industry and their professional

development needs to do so are, it is argued less frequently explored. Often it seems to me it is deficits in academics' willingness or competence to engage which is the focus of discussion.

The research also highlights that the notion of 'mainstream' students (who are full-time students) continues to create perceptions around the quality of learning achievable by students who are outside of the 'mainstream' student body. Ironically those outside of the mainstream student body have greater difficulty accessing student supports. The workplace is shown to present both opportunities and challenges with the challenges having the potential to be addressed if both HEIs and employers are resourced and committed to engagement. While the academy is willing to collaborate with employers it must also confidently assert its role in aspects around learning and teaching in which it is appropriately responsible for and has expertise in.

The research study highlights that in order to release the potential of engagement in WBL with employers, and to address challenges which engagement may present, national and institutional policies need to be developed which recognise, develop and sustain it as a mainstream HE activity.

It is hoped that this study will be of interest and contribute to the work of a number of stakeholders, that is, WBL researchers and academic practitioners, functional leaders within the Institute and higher education generally, policy makers and employers. Outlined below are the stakeholders who may be

interested in this research study together with aspects of it which may be of particular interest to them.

For WBL Researchers and Academic Practitioners

The findings of this research study will be of interest to WBL researchers and other members of the academic community interested in the development of WBL with external organisations. This research study has gone behind the academic lives of WBL Leaders and Academic Practitioners. Perhaps the motivations and experiences of the academic participants in this research study are not unique or perhaps they are. Either way it is hoped that by 'raising' the 'voices' of academics engaging in WBL with employers and professional bodies that it will stimulate more exploration of the professional lives and experiences of those working in the field, and thereby enhance the quality of WBL curricula.

Functional Leaders within the Institute and higher education

This research study has illuminated a number of issues which need further consideration if HEIs' engagement in WBL with employers is to be sustained and further developed. For example, clearly there are issues around human resource planning to ensure an adequate supply of academics interested in engaging in the field. Other issues such as enhancing the recognition of WBL as a mode of academic development need to be addressed as does responding to the tension which exists around perceptions that institutionally the activity is undervalued.

For policy makers

This study casts light on the motivation and experience of WBL Leaders and Academic Practitioners who are enthusiastic in respect of engaging in WBL curriculum development and delivery with employers. They voluntarily engage in this activity as part of their own academic development which they argue informs the curriculum generally. This study therefore will be of interest to policy makers interested in how higher education serves employers not just in respect of meeting the development needs of future employees, but also how the development of those already in the workforce serves to enhance the capacity of the academic community to prepare students for entry to the workforce.

Employers

Employers and their representatives will be interested in how partnerships with higher education work in practice. It is hoped that this study is a realistic account of partnership showing its possibilities and limitations. Within the context of partnerships with HEIs, it is hoped this research study will encourage organisations already involved to look at their role and responsibilities in WBL partnerships and for those not involved provide some insights as to how these might best be developed.

8.4 Limitations of the research

Educational research has been described as 'the hardest science of all' not because it is 'too soft' to be precise or reliable but because the conditions under which it is conducted make it 'the-hard-to-do' science (Berliner, 2002).

As was outlined earlier, during the course of this research study the operating environment of the Institute has undergone under considerable change.

As the researcher I came to the research study with my own conscious and unconscious pre-conceptions and beliefs. On my research journey I was carrying the double-edged sword of the insider researcher with all its accompanying advantages and disadvantages (Mercer, 2007). Prior to, during, and after the research the insider researcher and the participants are co-habitants of the same organisation. Ethical considerations are complex involving relational, moral and political considerations (Costley and Gibbs, 2006). It could be argued that every piece of research which involves asking people about their opinions and experiences is going to be flawed or limited in some way. A greater sin however would be to come to the research wanting to find absolutes. Even flawed or limited research serves to present new dimensions and perspectives which hopefully lead to new questions and an ongoing quest for temporary truths.

As outlined in Chapter 4, the Methodology, case study research has both strengths and weaknesses. This research study was inspired by a desire to research the experiences of WBL Leaders and Academic Practitioners, to hear academic practitioners' accounts of their daily lives, and to be able to hear the 'noise of real life' (Hodkinson & Hodkinson, 2001, p.3). There may be accusations that in doing case study research the possibility of generalising the findings is limited. If there is some aspect of the study which is unique to the participants interviewed in this research study and their experience of

engaging WBL with industry then this too is surely worthwhile researching in order that it may inform and be informed by other communities of practice. It is hoped that at least some of this study will resonant with, and be of interest to, WBL researchers, academic practitioners, functional leaders and policy makers both internally and externally to the Institute.

8.5 Suggestions for further areas for research

There are many areas which are worthy of further research which were highlighted during the course of this research study, for example,

- Developing understanding of WBL Academic Practitioners' construction of contemporary knowledge and their academic development needs in order to engage in WBL with employers and other external bodies. Do different disciplines pose different challenges or have different requirements in terms of academics remaining contemporary and close to practice?

- Researching WBL curricula to explore issues raised in the research study, for example, around the customisation requirements of industry in respect of WBL curricula, developing understanding of criticisms that higher educational curricula can be too theoretical and concerns around the quality of WBL programmes.

- Exploring the communities of practice which develop between academic and industry personnel involved in a WBL partnership and how these communities evolve during the course of the partnership.

- In the context of their involvement in a formal higher educational WBL programme, exploring how the workplace can contribute more effectively to the development of the WBL students/employees and the impact which students/employees participation on a WBL programme has on both the students/employees and their organisations.

8.6 Recommendations in respect of policy and practice

Arising from this research study, a number of recommendations in respect of policy and practice are made and these are outlined below.

1. Policies to enhance the recognition of WBL as a mechanism for knowledge exchange

Stakeholders need to enhance their recognition of WBL as a mechanism for knowledge exchange between HEIs and industry sectors. Institutionally, HEIs need to recognise that WBL with industry sectors can be deployed as a mode of academic development which supports the development of curricula generally. HEIs need to go beyond the rhetoric of mission statements and develop specific policies, systems, and structures in order to give visibility to WBL with industry, underpin its development and maximise its potential for all stakeholders.

2. Continuity of funding of WBL with industry

National funding models need to be put in place which supports HEIs and industry to develop and sustain lasting relationships and/or knowledge of particular industry sectors.

While due to the recession in Ireland the issue of the attractiveness of HEI entry salary levels to industry personnel may not be an issue, this matter needs to be addressed to ensure HEIs have the flexibility to offer salaries which will attract personnel from outside of the academy.

Within the Institute, any additional funds generated by WBL with industry should be reinvested in the development of WBL with industry including supporting the development of academics currently involved or who wish to become involved.

3. Institutional co-operation and collaboration

HEIs should establish a forum/s for WBL with industry to promote the sharing of practice and identify opportunities for collaboration.

4. Culture and equal status

Within the Institute there is much work to be done to enhance recognition of WBL with industry in order to overcome the perception that the activity is not valued and/or is not of equal status to other activities such as research.

5. Development of institutional strategies/school plans

Both institutionally and at the level of School there should be a clearer articulation of strategy in respect of WBL with industry and importantly specific objectives and targets set in respect of its development.

Schools and Departments should be supported to develop and implement strategies around WBL with industry, for example, supports around market research, publicity and promotion.

Human Resource Planning – recruitment and succession
ıning

Institute's Performance Management Development System should be
sed to collect data in respect of academic involvement in WBL with
ıstry. Schools should develop human resource plans to ensure a sufficient
ort of academics who wish to engage in WBL with industry.

barriers which inhibit the employment of industry personnel or experts to
k on WBL projects or make it a bureaucratic and time consuming process
ıld be eliminated.

Academic development

generic and discipline specific development needs of WBL academic
ers and practitioners should be identified. An appropriate development
should be developed which addresses issues such as sabbaticals in
stry, development of mentors, team building, negotiation as well as
ipline specific academic development needs.

impediments surrounding payment of membership fees to
essional/industry bodies in cases where an academic practitioner is
ely engaging with a sector or wishes to become engaged should be
oved. Policies around academic development should be flexible and
onsive to the needs of the academic community and take into account that
lopments outside of the academy may require academics to have timely
ss to new development opportunities.

8. Communities of practice

Institutionally and at School level, academic practitioners should be supported to develop WBL communities of practice involving academics and industry representatives in order to raise the visibility of the activity, facilitate sharing of practice and initiate collaborative projects.

9. Recognition and reward

At institutional level greater effort should be made to understand why there are negative perceptions surrounding recognition of the value of WBL with industry and steps should be taken to improve the situation including the development of performance metrics which recognise and reward achievements in WBL with industry.

10. Administrative and facilities support for the academic community

Among participants there was widespread dissatisfaction with the low level or absence of administrative and facilities support and there is a need for a significant improvement if WBL with industry is to grow.

11. Development of WBL with industry 'Good Practice Guides'

WBL with industry would benefit from the development of 'Good Practice Guide/s' which would provide advice and guidance and clearly articulate the roles and responsibilities of stakeholders.

12. Support for students

A coherent set of student supports need to be developed to support off-campus students and part-time students which give equal status to the needs of these students with services being delivered at times required by the students. Supports such as return to learning and a 'hotline' for guidance on assignments should be developed. Greater usage should also be made of online as well as face-to-face tutorial type supports.

13. The workplace

Senior managers need to recognise the important role which the workplace can provide in supporting student learning by ensuring organisational commitment and facilitating workplace opportunities for development. Organisational commitment to learning will not only support student learning but also facilitate organisations benefiting from student learning.

14. Collaboration among employers

In order to maximise opportunities for learning and to promote efficiencies and cost effectiveness employers should co-operate locally to develop collaborative relationships with HEIs.

15. Development and supports for managers and mentors

HEI and employers should develop initiatives which support the development of workplace managers and mentors and recognise the role which these managers and mentors play in the development, delivery and support of WBL programmes. Those managers developing and delivering on

WBL programmes should become 'associate' faculty of a HEI and be provided with academic development opportunities.

Closing comment

I began this research study to explore the motivation and experiences of academics who work with industry on the development and delivery of WBL curricula. I was surprised their motivation is so strongly linked to their desire to generally inform their practice. I was impressed by their commitment to providing access to higher education to students, many of whom have never had the opportunity to attend higher education. A small group of long-serving academics are doing what so many reports suggest. Consider the possibilities for societal and economic development if greater effort was made to go beyond the rhetoric of reports and pursue the development and implementation of policies, systems and structures that mainstream collaborative WBL curriculum development and delivery with employers.

Bibliography

Abreu, M., Grinevich, V., Hughes, A., Kitson, M., and Ternouth, P. (2008). *Universities, Business and Knowledge Exchange.* London, England: Council for Industry and Higher Education and Centre for Business Research, University of Cambridge.

Banim, M. & Evans, A. (2008). Creating and managing partnerships with employers: workforce development with public sector and private sector employers. In Higher Education Academy *Work-based learning Workforce development: Connections frameworks and processes* (pp.56-69). UK: The Higher Education Academy.

Barnett, R. (1994). Recovering an Academic Community: Above not Beyond In R. Barnett, (Ed.), *Academic Community Discourse or Discord?* (pp.3-20). London, England: Jessica Kingsley Publishers Ltd.

Barnett, R. (1997). Beyond Competence. In F. Coffield, & B. Williamson, (Eds.), *Repositioning Higher Education* (pp.27-44). Buckingham, England: Society for Research into Higher Education and Open University Press.

Barnett, R. (2000). *Realizing the University in an age of supercomplexity.* Buckingham, England: Society for Research into Higher Education and Open University Press.

Bassey, M. (1995). *Creating Education through Research: a Global Perspective of Educational Research for the 21st Century.* Newark: Kirklington Moor Press in association with the British Educational Research Association.

Bassey, M. (1999). *Case Study Research in Educational Settings.* Buckingham, England: Open University Press.

Becher, T. & Trowler, P.R. (2001). *Academic Tribes and Territories Intellectual enquiry and the culture of disciplines* (2nd ed.). Buckingham, England: Society for Research into Higher Education and Open University Press.

Bennett, R. & Kane, S. (2009). Employer engagement practices of UK business schools and departments: an empirical investigation. *Journal of Vocational Education & Training,* 61 (4) 495-516.

Bennich-Bjorkman, L. (2007). Has Academic Freedom Survived? – An Interview Study of the Conditions for Researchers in an Era of Paradigmatic Change. *Higher Education Quarterly,* 61(3), 334-361.

Berliner, D.C. (2002). Educational Research: The Hardest Science of All. *Educational Researcher,* 31 (8), 18-20.

Bok, D. (2003). *Universities in the Marketplace: the Commercialisation of Higher Education.* New Jersey, US: Princeton University Press.

Boland, T. (2011). *Revised Employment Control Framework for Higher Education Sector.* Statement by Tom Boland, Chief Executive, Higher Education Authority. Retrieved on 23 June 2011 from: http://www.hea.ie/en/node/1413.

Boud, D. & Solomon, N. (2000). Work as the curriculum: Pedagogical and identity implications Working Paper 07. *University of Technology Research Centre Vocational Education & Training Working Knowledge: Productive Learning at Work Conference Proceedings 10-13 December University of Technology, Sydney, New South Wales, Australia.* UTS Research Centre for Vocational Education and Training: Sydney, Australia.

Boud D. & Symes, C. (2000). Learning for Real: Work-based Education in Universities. In C. Symes, & J. McIntyre, (Eds.), *Working Knowledge The New Vocationalism and Higher Education,* pp.14-29. Buckingham, England: Society for Research into Higher Education and Open University Press.

Boud, D., Solomon, N. & Symes, C. (2001). New Practices for New Times. In D. Boud, & N. Solomon, (Eds.), *Work-based Learning A New Higher Education?* (pp. 3-17). Buckingham, England: Society for Research into Higher Education and Open University Press.

Boud, D. & Solomon, N. (2001). Future Directions for WBL: Reconfiguring Higher Education. In D. Boud, & N. Solomon, (Eds.), *Work-based Learning A New Higher Education?* (pp. 215-227). Buckingham, England: Society for Research into Higher Education and Open University Press.

Boud, D. (2001). Creating a Work-based Curriculum. In D. Boud, & N. Solomon, (Eds.), *WBL A New Higher Education?* (pp.44-58). Buckingham: Society for Research into Higher Education and Open University Press.

Boud, D. (2006). Combining work and learning The disturbing challenge of practice. In R. Edwards, J. Gallacher & S. Whittaker, (Eds.), *Learning Outside The Academy International research perspectives on lifelong learning* (pp.77-89). Abingdon Oxon, England: Routledge.

Boulton-Lewis, G., Pillay, H. & Wilss, L. (2006). Changing Workplace Environments, Conceptions and Patterns of Learning: Implications for University Teaching. In P. Tynjala, J. Valimaa, & G. Boulton-Lewis, (Eds.), *Higher Education and Working Life – Collaborations, Confrontations and Challenges* (pp. 145-161). Amsterdam: Elsevier.

Boyd, P. (2010). Academic induction for professional educators: supporting the workplace learning of newly appointed lecturers in teacher and nurse education. *International Journal for Academic Development,* 15 (2), 155-165

Boyer, E.L. (1990). *Scholarship Reconsidered Priorities of the Professoriate.* New Jersey, US: The Carnegie Foundation for the Advancement of Teaching.

Braham, J. & Pickering J. (2007). Widening Participation and Improving Economic Competitiveness; the dual role of work-based learning within Foundation Degrees. In Professor D. Young, & Professor J. Garnett, (Eds.), *Work-based Learning Futures: Proceedings from the Work-based Learning Futures Conference, April 2007, Buxton* (pp.45-52). University of Derby and Middlesex University, England.

Brennan, J. & Little, B. (1996). *A Review of Work-based Learning in Higher Education.* Leeds, England: DfEE

Brennan, J. Little, B. with Connor H., de Weert, E., Delve, S., Harris, J., Josselyn, B., Ratcliffe, N. , and Scesa, A. (2006). *Towards a strategy for workplace learning.* Report to HEFCE. UK: The Centre for Higher Education Research & Information (CHERI), Open University, and KPMG.

Brennan, J. (2007). The Academic Profession and Increasing Expectations of Relevance. In M. Kogan & U. Teichler (Eds.), *Key Challenges to the Academic Profession,* pp. 19-28. Paris and Kassel: UNESCO/INCHER.

British Educational Research Association (2004). *Revised Ethical Guidelines for Educational Research.* UK: BERA.

Brown, P. (1999). Globalisation and the Political Economy of High Skills. *Journal of Education and Work,* 12 (3), 233-251.

Bryman, A. (2004). *Social Research Methods,* (2nd ed.). Oxford, England: Oxford University Press.

Casey, C. (1999). The changing contexts of work. In D. Boud, & J. Garricks, (Eds.), *Understanding Learning at Work* (pp.15-28). London, England: Routledge.

Casey, C. (2003). The learning worker, organizations and democracy. *International Journal of Lifelong Education,* 22 (6) 620-634.

Castells, M. (2000). *The Rise of the Network Society The Information Age: Economy, Society and Culture, Volume I,* (2nd Ed.). Oxford, England : Blackwell Publishing.

Challis, Maggie (2007). Higher Education and the 'Caring' Employer: developing a sectoral approach to work-based learning. In Professor D. Young, & Professor J. Garnett, (Eds.), *Work-based Learning Futures: Proceedings from the Work-based Learning Futures Conference, April 2007, Buxton* (pp.37-44). University of Derby and Middlesex University, England.

Clancy, P. (2007). Resisting the Evaluative State: Irish Academics Win the Battle but Lose the War. In *Towards a cartography of higher education policy and change A Festschrift in Honour of Guy Neave* (pp. 111-118). Twente, the Netherlands: Centre for Higher Education and Policy Studies (CHEPS).

Cohen, L., Manion, L. & Morrison, K. (2000). *Research Methods in Education* (5th ed.). London, England: Routledge Falmer.

Collin, K. (2006). Connecting work and learning: design engineers' learning at work. *Journal of Workplace Learning,* 18 (7/8), 403-413.

Costley, C. (2001). Organizational and employee interests in programs of work based learning. *The Learning Organization,* 8 (2), 58-63.

Costley, C. (2007). Work-based learning: assessment and evaluation of higher education. Introduction in *Assessment & Evaluation 2007,* 32 (1), 1-9.

Costley C. & Armsby, P. (2007). WBL assessed as a field or a mode of study. *Assessment & Evaluation in Higher Education,* 32 (1) 21-33.

Costley, C. & Gibbs, P. (2006). Researching others: care as an ethic for practitioner researchers. *Studies in Higher Education,* 31 (1), 89-98.

Crawford, K. (2010). Influences on academics' approaches to development: voices from below. *International Journal for Academic Development,* 15 (3), 189-202.

Creswell, J.W. (1998). *Qualitative Inquiry and Research Design Choosing Among Five Traditions.* Thousand Oaks, California, U.S: Sage Publications, Inc.

Crotty, M. (1998). *The Foundations of Social Research meaning and perspective in the research process.* London, England: Sage Publications.

De Boer, H. Huisman, J., Klemperer, A., Van der Meulen, B., Neave, G., Tens H. & Van der Wende, M. (2002). *Academia in the 21st Century An analysis of trends and perspectives in higher education and research.* Centre for Higher Education Policy Studies (CHEPS), University of Twente. Commissioned by Adviesraad voor het Wetenschaps – en Technologiebeleid (AWT).

Deem, R. (2001). Globalisation, New Managerialism, Academic Capitalism and Entrepreneurialism in Universities: is the local dimension still important? *Comparative Education,* 37 (1) , 7-20.

Delanty, G. (2001). *Challenging Knowledge: The University in the Knowledge Society.* Buckingham, England: Society for Research into Higher Education and Open University Press.

Department of An Taoiseach (2006). *Towards 2016 Ten-Year Framework Social Partnership Agreement 2006-2015.* Dublin, Ireland: Stationery Office.

Department of Education & Science (2007). *Sé Sí Gender in Irish Education.* Dublin, Ireland: Government Publications.

Dunne, M, Pryor, J. & Yates, P. (2005). *Becoming a Researcher a research companion for the social sciences.* Maidenhead, Berkshire, England: Open University Press.

Economic and Social Research Institute (2008). *Quarterly Economic Commentary Summer 2008.* Retrieved 21 June 2011 from: http://www.esri.ie/UserFiles/publications/20080623114553/QEC2008Sum_ES.pdf

Education in Employment Project, Strategic Innovation Fund Project (2008). Work-Based Learning, Graduating through the Workplace, Dr. Margaret Linehan (Ed.). Cork, Ireland: CIT Press.

Einsiedel, A.A. (1998). Changing and Emerging Trends in the CE Function on University Campuses. *Canadian Journal of Continuing Education,* 24 (1), pp.9-24.

Eisenhart, M. & DeHaan, R.L. (2005). Doctoral Preparation of Scientifically Based Researchers. *Educational Researcher,* 34 (4), pp.3-13.

Elmuti, D, Abebe, M. & Nicolosi, M. (2005). An overview of strategic alliances between universities and corporations. *The Journal of Workplace Learning,* 17 (1/2), 115-129.

Enterprise Strategy Group (2004). *Ahead of the Curve Ireland's Place in the Global Economy.* Dublin, Ireland: Forfás.

Eraut, M. (1994). *Developing Professional Knowledge and Competence.* London, England: The Falmer Press.

Eraut, M. (2001). Theories of Professional Expertise. In C. Paechter, M. Preedy, D. Scott, & J. Soler, (Eds.), *Knowledge, Power and Learning* (pp.109-127). London, England: Paul Chapman Publishing Ltd. in association with the Open University Press.

Eraut, M. & Hirsh, W. (2007). *The Significance of Workplace Learning for Individuals, Groups and Organisations.* UK: Economic and Social Research Council (ERSC) Centre on Skills, Knowledge and Organisational Performance (SKOPE).

European Centre for the Development of Vocational Training (CEDEFOP, 2011). Vocational education and training at higher qualification levels, *Research Paper No. 15.* Luxembourg: Publication Office of the European Union.

Evans, K., Guile, D., Harris, J., & Allan, H. (2010). Putting knowledge to work: A new approach. *Nurse Education Today,* 30 (3), 245-251.

Eyres, R.D., Hooker, E. & Pringle, A. J. (2008). Engaging with Workforce development: what do staff in higher education need? *Work-based learning Workforce development: connection, frameworks and Processes* (pp. 99-110). UK: The Higher Education Academy.

Felstead, A., Fuller, A., Unwin, L., Ashton, D., Butler, P. & Lee, T. (2005). Surveying the scene: learning metaphors, survey design and the workplace context. *Journal of Education and Work,* 18 (4), 359-383.

Ferman, T. (2002). Academic professional practice: What lecturers find valuable. *International Journal for Academic Development,* 7 (2), 146-158.

Finnegan, R. (1994). Recovering 'Academic Community' What Do We Mean? In R. Barnett, (Ed.), *Academic Community Discourse or Discord* (pp.178-193). London, England: Jessica Kingsley Publishers Ltd.

Fisher, S. (2006). Does the 'Celtic Tiger' society need to debate the role of higher education and the public good? *International Journal of Lifelong Education,* 25 (2), 157-172.

Forfás (2009). *Sharing our Future: Ireland 2025 Strategic Policy Requirements for Enterprise Development.* Dublin, Ireland: Forfás.

Forfás (2010). *Making it Happen Growing Enterprise for Ireland,* Dublin, Ireland: Forfás.

Forfás (2011). *The Expert Group on Future Skills Needs Statement of Activity 2010.* Dublin, Ireland: Forfás.

Fowler Davis, S. (2009). Knowledge exchange: capacity building in a small University. *Education + Training,* 51 (8/9), 682-695.

Fuller, A., Munro, A. & Rainbird, H. (2004). Conclusion. In H. Rainbird, A. Fuller and A. Munro, (Eds.), *Workplace Learning in Context* (pp.299-306). London, UK: Routledge.

Fuller, A. & Unwin, L. (2004). Expansive learning environments: integrating organizational and personal development. In H. Rainbird, A. Fuller and A. Munro, (Eds.), *Workplace Learning in Context* (pp.126-144). London, UK: Routledge.

Garnett, J. (2001). Work based learning and the intellectual capital of universities and employers. *The Learning Organisation,* 8 (2), 78-81.

Garnett, J., Workman, B., Beadsmore, A. & Bezencenet, S. (2008). Developing the structural capital of higher education institutions to support work-based learning programmes. In Higher Education Academy *Work-based learning Workforce development: connections frameworks and processes* (pp.18-30). UK: The Higher Education Academy.

Garrick, J. & Kirkpatrick, D. (1998). Workplace-based Learning Degrees: a new business venture, or a new critical business? *Higher Education Research & Development,* 17 (2), 171-182.

Gibbons, M., Limoges, C., Nowotny, H., Schwartzman, S., Scott P. & Trow, M. (1994). *The New Production of Knowledge: the dynamics of science and research in contemporary societies.* London, England: Sage.

Gibbs, P. (2001). Higher Education as a Market: a problem or solution? *Studies in Higher Education,* 26 (1), 85-94.

Gibbs, P.T. & Morris, A.F. (2001). The accreditation of work experience: whose interests are served? *The Learning Organisation,* 8 (2), 82-88.

Gomm, R. (2004). *Social Research Methodology a critical introduction.* Houndmills, Basingstoke, England: Palgrave Macmillan.

Gough, D. (2004). Systematic research synthesis. In G. Thomas & R. Pring, (Eds.), *Evidence-based practice in education* (pp.44-62). Buckingham, England: Open University Press.

Government of Ireland (2003). *Sustaining Progress Social Partnership Agreement 2003-2005.* Dublin, Ireland: Stationery Office.

Government of Ireland, Department of the Taoiseach (2008). *Building Ireland's Smart Economy A Framework for Sustainable Economic Renewal.* Dublin, Ireland: Stationery Office.

Government of Ireland, Department of Finance (2009a). *Report of the Special Group on Public Service Numbers and Expenditure Programmes* Volume I. Dublin, Ireland: Stationery Office.

Government of Ireland, Department of Finance (2009b). *Report of the Special Group on Public Service Numbers and Expenditure Programmes* Volume II. Dublin, Ireland: Stationery Office.

Government of Ireland *(2010). National Strategy for Higher Education Draft Report of the Strategy Group,* 9 August 2010.

Government of Ireland (2010). *The National Recovery Plan 2011-2014.* Dublin, Ireland: Stationery Office.

Government of Ireland (2011). *National Strategy for Higher Education to 2030 Report of the Strategy Group 2011.* Dublin, Ireland: Stationery Office.

Green, A. (1999). Education and globalization in Europe and East Asia: convergent and divergent trends. *Journal of Education Policy,* 14 (1), 55-71.

Gustavs, J. and Clegg, S. (2005). Working the Knowledge Game? Universities and Corporate Organizations in Partnership. *Management Learning,* 36 (1), 9-30.

Hager, P. (2000). Knowledge that Works: Judgement and the University Curriculum. In C. Symes, & J. McIntyre, (Eds.), *Working Knowledge The NewVocationalism and Higher Education* (pp.47-65). Buckingham, England: Society for Research into Higher Education.

Hager, P. (2003). Changing Pedagogy: Productive Learning. OVAL Research Working Paper 03-16. Sydney, Australia: UTS, The Australian Centre for Organisational, Vocational and Adult Learning.

Hammersley, M. & Gomm, E. (1997). Bias in Social Research. *Sociological Research Online,* Vol. 2, No. 1, Retrieved on 13 November 2008 from: http:///www.socresonline.org.uk/2/1/2.html

Harvey, M. (2007). The Changing Power Balance Between Learners, Universities and Work Contexts. In Professor D. Young, & Professor J. Garnett, (Eds.), *Work-based Learning Futures: Proceedings from the Work-based Learning Futures Conference, April 2007, Buxton* (pp.28-35). University of Derby and Middlesex University, England.

Hazelkorn, E. (2005). Institutional Mission vs. Policy Constraint? Unlocking Potential. *Higher Education Management and Policy, OECD,* vol. 17, no. 2, 43-60.

Hazelkorn, E. (2009). Impact of Global Rankings on Higher Education Research and the Production of Knowledge. *UNESCO Forum on Higher Education, Research and Knowledge,* Occasional Paper No. 15. Available at: http://unesdoc.unesco.org/images/0018/001816/181653e.pdf

Hazelkorn, E. (2011). Building a World-Class System in Ireland's Financial Crisis. *International Higher Education*, Issue 64, pp.12-14. Available at: http://www.bc.eu/research/cihe/ihe.html

Healey, M. & Jenkins, A. (2002). Discipline-based Educational Development. In H. Eggins, & R. Macdonald, (Eds.), *The Scholarship of Academic Development* (pp.47-57). Buckingham, UK: Society for Research into Higher Education and Open University Press.

Henkel, M. (2000). *Academic Identities and Policy Change in Higher Education.* London, England: Jessica Kingsley Publishers Ltd.

Higher Education Academy (2006). *WBL: illuminating the higher education academy final report,* Report prepared by: I. Nixon, K. Smyth, R. Stafford, S. Camm, KSA Partnership. UK: HEA.

Higher Education Authority (2009). Study on the Costs of Participation in Higher Education. Dublin, Ireland: HEA/National Office for Equity of Access to Higher Education.

Higher Education Authority (June 2011) Criteria for Designation to Technological University Status. Retrieved on 24 June 2011 from: http://www.hea.ie/files/files/file/News/CirculationCriteriaTechnologicalUniversity.pdf

Hockey, J. (1993). Research Methods – researching peers and familiar settings. *Research Papers in Education,* 8 (2), 99-225.

Hodkinson, P. & Hodkinson, H. (2001). The Strengths and Limitations of Case Study Research. *Paper presented to the Learning and Skills Development Agency Conference Making an Impact on Policy and Practice Cambridge,* 5-7 December 2001.

Holian, R. (1999). Doing research in my own organisation: ethical dilemmas, hopes and triumphs. *Action Research International.* Retrieved on 6 December 2008 from: http://www.scu.edu.au/schools/gcm/ar/ari/p-rholian99.html

Houlbrook, M. (2009). *The Politics of Work-based Learning experiences in the Australian community sector.* Koln, Germany: LAP Lambert Academic Publishing.

Hufner, K. (2003). Higher Education as a Public Good: Means and Forms of Provision. *Higher Education in Europe,* xxviii (3), 339-348.

Innovative Research Universities Australia (2005). *The Third Mission of Universities – Business and Community Engagement, Outreach and Regional Development Building a case for Third Stream funding of Australian Universities.* Discussion paper. Retrieved on 13 August 2010 from: http://www.iru.edu.au/_data/assets/pdf_file/008/172772/building-case-third-stream-funding.pdf

Institutes of Technology Act 2006 Dublin, Ireland: Stationery Office.

Irving, K. (2008). Organising assessment. In Higher Education Academy *Work-based learning Workforce Development: Connections, frameworks and processes* (pp. 74-85). UK: The Higher Education Academy

Janesick, V.J. (2003). The Choreography of Qualitative Research Design: Minuets, Improvisations, and Crystallization. In N.K. Denzin, & Y.S. Lincoln, (Eds.) *Strategies of Qualitative Inquiry* (2nd ed.), pp.46-79. Thousand Oaks, California, US: Sage Publications.

Jarvis, P. (1999). Global Trends in Lifelong Learning and the Response of the Universities. *Comparative Education,* 35 (2), 249-257.

Johnson, D. (2001). The Opportunities, Benefits and Barriers to the Introduction of Work-Based Learning in Higher Education. *Innovations in Education and Teaching International,* 38, 4, 364-368.

Jongbloed, B. (2003). Marketisation in Higher Education, Clark's Triangle and the Essential Ingredients of Markets. *Higher Education Quarterly,* 57 (2), 110-135.

Kinman, R. & Kinman, G. (2000). What's That Got To Do with Making Motor Cars?' The influence of corporate culture on 'in-company' degree programmes. *Journal of Education and Work,* 13 (1), 5-24.

Kitwood, T. (1976). Educational Research and its Standing as Science. *Studies in Higher Education,* 1 (1) 69-82.

Kreber, C. (2005). Charting a critical course on the scholarship of university teaching movement. *Studies in Higher Education,* 30 (4), 389-405.

Kvale, S. (2007). *Doing Interviews.* London, England: Sage Publications Ltd.

Labanyi, D. (2010, 28 November). Ireland to receive €85 billion bailout at 5.8% interest rate. *The Irish Times.*. Retrieved on 23 June 2011 from: http://www.irishtimes.com/newspaper/breaking/2010/1128breaking1_pf.html

Lave, J. & Wenger, E. (1991). *Situated Learning Legitimate Peripheral Participation.* Cambridge, England: Cambridge University Press.

Le Gallais, T. (2008). Wherever I go there I am: reflections on reflexivity and the research stance. *Reflective Practice,* 9 (2), 145-155.

Leshem, S. (2007). Thinking about conceptual frameworks in a research community of practice: a case of a doctoral programme. *Innovations in Education and Teaching International,* 44 (3), 287-299.

Lester, S. & Costley, C. (2010) Work-based learning at higher education level: value, practice and critique. *Studies in Higher Education,* 35 (5), 561-575.

Lyons, F. & Young, D. (2008). Supporting work-based learning: listening to the Learners. In The Higher Education Academy *Work-based Learning Workforce development: connections, frameworks and processes* (pp. 86-98). UK: The Higher Education Academy.

McCracken, A. (2010). Legitimising Work-based Learning Programmes of Study. In S.Roodhouse, & J. Mumford, (Eds.). *Understanding Work-Based Learning* (pp. 29-39). Farnham, Surrey: Gower Publishing Limited.

Macdonald, R. (2002). Developing a Scholarship for Academic Development: Setting the Context. In H. Eggins, & R. Macdonald, (Eds.), *The Scholarship of Academic Development* (pp.1-10). Buckingham, England: Society for Research into Higher Education and Open University Press.

McFarlane, A. (1998). Information, Knowledge and Learning. *Higher Education Quarterly,* 52 (1) 77-92.

McIntyre, J. & Solomon, N. (2000). The Policy Environment of Work-based Learning: Globalization, Institutions and Workplaces. In C. Symes, & J. McIntyre, (Eds.), *Working Knowledge The New Vocationalism and Higher Education* (pp.84-97). Buckingham, England: Society for Research into Higher Education and Open University Press.

McNair, S. (2001). Social, economic and political contexts. In P. Jarvis, (Ed.), *The Age of Learning Education and the Knowledge Society* (pp.16-26). London, England: Kogan Page.

Marginson, S. (1997). Steering from a distance: power relations in Australian higher education. *Higher Education,* 34, 63-80.

Marginson, S. (1999). After globalization: emerging politics of education. *Journal of Education Policy*, 14 (1), 19-31.

Martin, I. (2003). Adult education, lifelong learning and citizenship: some ifs and buts. *International Journal of Lifelong Education,* 22 (6), 566-579.

Matthews, J.H. & Candy, P.C. (1999). New dimensions in the dynamic of learning and knowledge. In D. Boud, & J. Garricks, (Eds.), *Understanding Learning at Work* (pp. 47-64). London, England: Routledge.

May, T. (2001). *Social Research Issues, Methods and Process* (3rd ed.). Buckingham, England: Open University Press.

Mercer, J. (2007). The challenges of insider researcher in educational institutions: wielding a double-edged sword and resolving delicate dilemmas. *Oxford Review of Education,* 33 (1), 1-17.

Miles, M.B. & Huberman, A.M. (1994). *Qualitative Data Analysis* (2nd ed.). London, England: Sage Publications.

Minton, A. (2010). Supporting Learners Through Mentoring in the Workplace. In S. Roodhouse, & J. Mumford, (Eds.). *Understanding Work-Based Learning* (pp. 61-74). Farnham, Surrey. UK: Gower Publishing Limited.

Miron, D. (2008). Linking the double helix of learning and work to the triple helix of university-industry-government in the Europe of knowledge. *Management and Marketing,* 3 (4), 3-20.

National Centre for Partnership and Performance (NCPP), Forum on the Workplace of the Future (2004). *Working to our advantage A National workplace strategy.* Dublin, Ireland: National Centre for Partnership and Performance.

National Competitiveness Council (2009). *Statement on Education and Training.* Dublin, Ireland: Forfás.

Nicholls, G. (2005). New lecturers' constructions of learning, teaching and research in higher education. *Studies in Higher Education,* 30 (5), 611-625.

Nixon, J. (2001). A new professionalism for higher education? In G. Nicholls, (Ed.), *Professional Development in Higher Education new dimensions and directions* (pp.73-88). London, England: Kogan Page.

Nixon, I. (2008). Work-based learning Impact Study prepared by I. Nixon, The KSA Partnership for the Higher Education Academy. UK: HEA.

O'Brien, D. (2011, 15 March). Unemployment rate hits 14%. *The Irish Times..* Retrieved on 29 June 2011 from: http://www.irishtimes.com/newspaper/breaking/2011/0315/breaking21_pf.html

Onyx, J. (2001). Implementing WBL for the First Time. In D. Boud, & N. Solomon, (Eds.), *Work- Based Learning A New Higher Education?* (pp. 126-140). Buckingham, England: Society for Research into Higher Education and Open University Press.

Organisation for Economic Co-Operation and Development (2004). *Review of National Policies for Education: Review of Education in Ireland Examiner's Report.* Paris, France: OECD.

Pallas, A.M. (2001). Preparing Education Doctoral Students for Epistemological Diversity. *Educational Researcher,* 30 (5), 6-11.

Paterson, L. (2003). The Survival of the Democratic Intellect: Academic Values in Scotland and England. *Higher Education Quarterly,* 57 (1), 67-93.

Portwood, D. (2001). Making It Work Institutionally. In D. Boud, & N. Solomon, (Eds.), *Work-based Learning: A New Higher Education?* (pp.74-102). Buckingham: Society for Research into Higher Education and Open University Press.

Pring, R. (2003). The virtues and vices of an educational researcher. In P. Sikes, J. Nixon, & W. Carr, (Eds.), *The Moral Foundation of Educational Research Knowledge Inquiry Values* (pp.52-67). Maidenhead, Berkshire, UK: Open University Press.

Pring, R. (2004). *Philosophy of Educational Research* (2nd ed.). London, England: Sage Publications Ltd.

Public & Corporate Economic Consultants (PACEC) and the Centre for Business Research, University of Cambridge (2010). *Synergies and Trade-offs Between Research, Teaching and Knowledge Exchange.* A report to HEFCE. UK: PACEC and The Centre for Business Research, University of Cambridge, England.

Qualifications (Education and Training) Act, 1999. Dublin, Ireland: Stationery Office.

Reeve, F. & Gallacher, J. (2000). Implementing work-based learning in higher education: exploring control and negotiation in the curriculum. *Working Knowledge: productive learning at work Conference proceedings, University of Technology Sydney, 10-13 December 2000. Working Paper 45.* UTS Research Centre for Vocational Education and Training Centre: Sydney, Australia.

Rhodes, G. & Shiel, G. (2007). Meeting the needs of the workplace and the learner through work-based learning. *Journal of Workplace Learning, 19, 3, 173-187.*

Rhoades, G. & Slaughter, S. (2006). Mode 3, Academic Capitalism and the New Economy: Making Higher Education Work for Whom? In P. Tynjala, J. Valimaa, & G. Boulton-Lewis, (Eds.), *Higher Education and Working Life – Collaborations, Confrontations and Challenges* (pp. 9-33). Amsterdam, The Netherlands: Elsevier.

Roadmap for Employment-Academic Partnerships (REAP), (2010). Partnerships for progress higher education and external engagement. In M. Linehan, & I. Sheridan, (Eds.), *Report of the Conference Proceedings Partnership for Progress 23 September 2010, Farmleigh House, Phoenix Park, Dublin.* Ireland: REAP, a Strategic Innovation Fund Project.

Richardson, L. (2003). Writing A Method of Inquiry. In N.K. Denzin, & Y.S. Lincoln, (Eds.), *Strategies of Qualitative Inquiry* (2nd ed.), (pp. 499-541). Thousand Oaks, California, US: Sage Publications.

Robson, C. (2002). *Real World Research A Resource for Social Scientists and Practitioner-Researchers* (2nd ed.). Massachusetts, US: Blackwell Publishing.

Rooney, P. (2005). Researching from the inside – does it compromise validity? A Discussion. *Level 3.* May 2005, No. 3. Available at: http://level3.dit.ie/html/issue3_list.html

Roodhouse, S. (2010a). The Genesis of University Work-Based Learning. In S. Roodhouse, & J. Mumford, (Eds.), *Understanding Work-Based Learning* (pp.11-19). Farnham, Surrey, England: Gower Publishing Limited.

Roodhouse, S. (February, 9, 2010b). The days of plenty are gone, so let's embrace the employer-led degree. *The Guardian.* Retrieved from: http://www.guardian.co.uk/education/2010/feb/09/employer-led-degree-new-universit . . .

Rosovsky, H. (2002). No Ivory Tower: University and Society in the Twenty-First Century. In W.Z. Hirsch & L.E. Weber, (Eds.), *As the Walls of Academia are Tumbling Down* (pp. 13-30). France: Economica.
Scott, P. (2000). A Tale of Three Revolutions? Science, Society and the University. In P. Scott, (Ed.), *Higher Education Re-formed* (pp. 190-206). London, England: Falmer Press.

Sfard, A. (1998). On Two Metaphors for Learning and the Dangers of Choosing Just One. *Educational Researcher,* 27 (2), 4-13.

Shreeve, A. (2011). Being in two camps: conflicting experiences for practice-based academics. *Studies in Continuing Education,* 33 (1), 79-91.

Singh, M. (2007). Universities and Society: Whose Terms of Engagement? In S. Sorlin, & H. Vessuri, (Eds.), *Knowledge Society Vs. Knowledge Economy: Knowledge, Power and Politics* (pp. 53-78). New York, US: Palgrave MacMillian.

Skilbeck, M. (2001). *The University Challenged: A Review of International Trends and Issues with Particular Reference to Ireland.* Dublin, Ireland: Higher Education Authority and the Confederation of Heads of Irish Universities.

Slaughter, S. & Rhoades, G. (2004). *Academic Capitalism and the New Economy Markets, State, and Higher Education.* Baltimore, US: The John Hopkins University Press.

Slotte, V. & Tynjala, P. (2003). Industry-University Collaboration for Continuing Professional Development. *Journal of Education and Work,* 16 (4), 445-464.

Smith, J. (2010). Forging identities: the experiences of probationary lecturers in the UK. *Studies in Higher Education,* 35 (5), 577-591.

Smith, R. & Betts, M. (2000). Learning as partners: realising the potential of work-Based learning. *Journal of Vocational Education and Training,* 52 (4), 589-604.

Solomon, N. & McIntyre, J. (2000). Deschooling Vocational Knowledge: Work-Based Learning and the Politics of Curriculum. In C. Symes, & J. McIntyre, (Eds.), *Working Knowledge The New Vocationalism and Higher Education* (pp. 111-122). Buckingham, England: Society for Research into Higher Education and Open University Press.

Sorlin, S. & Vessuri, H. (2007). The Democratic Deficit of Knowledge Economies. In S. Sorlin & H. Vessuri, (Eds.), *Knowledge Society Vs. Knowledge Economy: Knowledge, Power and Politics* (pp. 1-33). New York, US: Palgrave MacMillian.

Stake, R.E. (1995). *The Art of Case Study Research.* Thousand Oaks, California, US: Sage Publications.

Stake, R.E. (2003). Case Studies. In N.K. Denzin, & Y.S. Lincoln, (Eds.), *Strategies of Qualitative Inquiry* (2nd ed.), (pp.134-164). Thousand Oaks, California, US: Sage Publications.

Stark, S. & Torrance, H. (2005). Case Study. In B. Somekh, & C. Lewin, (Eds.), *Research Methods in Social Science* (33-40). London, England: Sage Publications.

Strike, S. & Taylor, J. (2009). The Career Perceptions of Academic Staff and Human Resource Discourses in English Higher Education. *Higher Education Quarterly,* 63 (2), 177-195.

Sutz, J. (1997). The New Role of the University in the Productive Sector. In H. Etzkowitz, & L. Leydesdorff, (Eds.), *Universities and the Global Knowledge Economy A Triple Helix of University-Industry-Government Relations* (pp. 11-20). London, England: Pinter.

Teichler, U. (1999). Higher education policy and the world of work: changing conditions and challenges. *Higher Education Policy,* 12 (1999), 285-312.

Tennant, M. (2000). Learning to Work, Working to Learn: Theories of Situational Education. I C. Symes, & J. McIntyre, (Eds.), *Working Knowledge The New Vocationalism and Higher Education* (pp. 123-134). Buckingham, England: Society for Research into Higher Education.

Thompson, G. (2000). Reconceptualizing University Extension and Public Service. *Canadian Journal of University Continuing Education,* 26 (1), 51-77.

Tight, M. (2002). *Key Concepts in Adult Education and Training* (2nd ed.). London, England: Routledge.

Tight, M. (2006). Changing Understandings of 'Public' and 'Private' in Higher Education: the United Kingdom Case. *Higher Education Quarterly,* 60 (3), 242-256.

Trow, M. (1974). Problems in the Transition from Elite to Mass Higher Education. In *Policies for Higher Education* (pp. 51-101). Paris, France: Organisation for Economic Co-operation and Development.

Teachers' Union of Ireland (2011, January). Public Service Agreement 2010-2014 Outcome of Discussions. Dublin, Ireland: TUI.

Usher, R. (1996). A critique of the neglected epistemological assumptions of educational research. In D. Scott, & R. Usher, (Eds.), *Understanding Educational Research* (pp. 9-32). London, England: Routledge.

Usher, R. (2000). Imposing Structure, Enabling Play: New Knowledge Production and the 'Real World' University. In C. Symes, & J. McIntyre, (Eds.), *Working Knowledge The New Vocationalism and Higher Education* (pp. 98-110). Buckingham, England: Society for Research into Higher Education.

Vaughan, R. (2008). Conceptual Framework. Presentation by Professor Roger Vaughan, Bournmouth University. Available at: http://ip-72-167-142-143.ip.secureserver.net/pt/case%20study%20research%20design%20and%20methods%20yin-ppt-2.html

Walsh, A. (2008). What is distinctive about work-based knowledge and learning? In The Higher Education Academy *Work-based learning Workforce development: connections, frameworks and Processes* (pp. 8-17). UK: The Higher Education Academy.

Walters, S. & Watters, S. (2001). Lifelong learning, higher education and active citizenship: from rhetoric to action. *International Journal of Lifelong Education,* (20) 6, 471-478.

Whitchurch, C. (2008). Shifting Identities and Blurring Boundaries: The emergence of Third Space Professionals in UK Higher Education. *Higher Education Quarterly,* 62 (4), 377-396.

White, T. (2001). *Investing in People Higher - Education in Ireland from 1960 to 2000.* Dublin, Ireland: Institute of Public Administration.

Woodhall, M. (1997). Human Capital Concepts. In A.H. Halsey, H. Lauder, P. Brown, & A. Stuart Wells, (Eds.), *Education, Culture, Economy and Society* (pp. 219-223). Oxford, England: Oxford University Press.

Yin, R.K. (2003). *Case Study Research Design and Methods* (3rd ed.). Thousand Oaks, California, US: Sage Publications.

APPENDICES

Appendix I

Initial email sent to potential participants

Insert name

Re: Doctoral Research Project (University of Sheffield) – Research Student: Sandra Fisher

I am doing a doctorate in education with the University of Sheffield and am researching the implications for programme development and delivery when a publicly funded HEI works with a company to develop and deliver a programme aimed at meeting the learning needs of the client company's employees. As I understand that you have experience in this area I would very much appreciate if I could interview you. The interview would take about an hour and would be taped with a transcript supplied to you and an opportunity to amend it. If you are willing to participate I can send you on additional information.

Many thanks

Kind regards

Sandra (Fisher)
EdD Research Student (University of Sheffield)

Tel. 087 90 77 485

Appendix II

Email sent to participants finalising arrangements for interview and forwarding in advance Participant Consent Form, Participant Information Sheet and Participant Profile Sheet

Many thanks for agreeing to be interviewed at (insert time) on (insert date) in (insert venue).

With this email you will find:

(i) Participant Consent Form (which will be signed on – insert date of interview)
(ii) Participant Information Sheet (which provides some background to the research project)
(iii) Participant Profile Sheet (which may be completed in advance, if you have time).

Before the interview begins I will ask you to sign the Participant Consent Form (a copy may be retained by you). The interview will be taped and a copy of the transcript will be sent to you and you will be given an opportunity to amend it. This transcript (or an amended version of it) will then become the data source for analysis.

If you require any further information please do not hesitate to contact me (tel. 01 402 3308 or 087 90 77 485).

Many thanks again for your support.

Kind regards

Sandra (Fisher)
EdD Research Student (University of Sheffield)

Attachments (i) Participant Consent Form (iii) Participant Information Sheet (iii) Participant Profile Sheet.

Appendix III

School of Education University of Sheffield
Participant Consent Form

Title of Project: What are the implications for the form and process of curriculum development when a HEI collaborates with employers in developing work-based learning curricula?

Name of Researcher: Sandra Fisher

Participant Identification Number for this Project:

Please initial

1. I confirm that I have read and understood the information sheet dated _____ for the above project and have had the opportunity to ask questions. _____

2. I understand that my participation is voluntary and that I am free to withdraw at any time without giving any reason. _____

3. I understand that my responses will be anonymized before analysis. I give permission for members of the research team to have access to my anonymized responses. _____

I agree to take part in the above project.

_____	_____	_____
Name of Participant	Date	Signature

_____	_____	_____
Researcher	Date	Signature

Copies: One copy for the participant and one copy for the Principal Investigator/Supervisor.

Appendix IV

Academic Participant Information Sheet

Researcher: Sandra Fisher, Doctorate of Education, postgraduate student with the School of Education, University of Sheffield.

Working Title of Research Project: What are the implications for the form and process of curriculum development when a HEI collaborates with employers in developing work-based learning curricula?

Ethical Approval: I have received approval from the University of Sheffield's Ethics Committee to undertake this research which is supervised by Professor Sue Webb, School of Education, University of Sheffield

The Research Project: As part of a Doctorate in Education with the University of Sheffield I am researching the experience of academics and other relevant staff who work directly with employers to develop and deliver programmes aimed at meeting the learning needs of their employees. As you have experience in the research area, which I believe will make a valuable contribution to the development of policy and practice in the field of work-based learning and employer engagement, I would very much welcome your participation in an interview.

During the interview you will be asked to describe and reflect on your experience of programme development, delivery and employer engagement. You will also have an opportunity to put forward ideas or suggestions you have in respect of policy and practice in the areas of work-based learning, programme development and delivery and employer engagement. The main areas to be covered in the interview are outlined below with some indicative subcategories which may arise.

The Interview and the Data: The interview will take about an hour and be taped. A transcript will be sent to you to for your records. If you wish to make any amendments to the transcript these should be forwarded to me within two weeks of receiving the transcript. After two weeks, the transcript or your amended version will be the data source for analysis for inclusion in my doctoral thesis and journals. The data will be anonymized - participants will be referred to by their Faculty/discipline and the industry sector they have worked with. Access to the data will be restricted to me as the researcher and those involved with the research project (e.g. appropriate personnel from the University of Sheffield).

WBL programme development and delivery with industry (indicative areas for discussion)

Main categories for discussion	***Some indicative subcategories are outlined below but based on your experience you are free to make additional suggestions***
Why did you become involved in working with an employer/s?	What has influenced your interests and beliefs around programme development with employers
Your experience of programme development when working with an employer	Academic knowledge, theory versus practice, developing the programme, partnership, accreditation, structures and processes (both formal and informal) involved in programme development, academic development, etc.
Your experience of programme delivery when working with an employer	Selection of students, admission criteria for students, teaching methods, issues around staffing (teaching), assessment, progression, structures and processes (both formal and informal) related to delivery, academic staff development, supports in the workplace, etc.
Reflections/suggestions in respect of developments in policy and practice in the development and delivery of programmes with industry.	For example, on understanding of WBL, employer partnership, accreditation, enhancing the linkage of theory and practice, academic staff development, resourcing, supports, etc.

Appendix V

Functional Participant Information Sheet

Researcher: Sandra Fisher, Doctorate of Education, postgraduate student with the School of Education, University of Sheffield.

Working Title of Research Project: What are the implications for the form and process of curriculum development when a HEI collaborates with employers in developing work-based learning curricula?

Ethical Approval: I have received ethical approval from the University of Sheffield's Ethics Committee to undertake this research which is supervised by Professor Sue Webb, School of Education, University of Sheffield

The Research Project: As part of a Doctorate in Education with the University of Sheffield I am researching the experience of academics and other relevant staff who work directly with employers to develop and deliver programmes aimed at meeting the learning needs of their employees. Part of the research project examines the role of institutional policies and practices which impact on the work of academics that are engaging directly with employers in order to develop a specific programme/s to meet the learning needs of the organisation. As you have knowledge and experience of institutional policies and practices I would very much welcome your participation in an interview.

During the interview you will be asked to describe and reflect on your knowledge and experience of institutional policies and practices, for example, in the areas of institutional mission, human resources, and finance. You will have an opportunity to put forward ideas or suggestions that you may have in respect of the Institute's policies and practices.

The Interview and the Data: The interview will take about 45-60 minutes and be taped. Within approximately four weeks a transcript will be sent to you to for your records. If you wish to make any amendments to the transcript these should be forwarded to me within two weeks of receiving the transcript. After two weeks, the transcript or your amended version will be the data source for analysis for inclusion in my doctoral thesis and journals. The data will be anonymized, that is participants names will not be included instead participants will be referred to by Function/ Faculty/discipline. Access to the data will be restricted to me as the researcher and those involved with the research project (e.g. appropriate personnel from the University of Sheffield).

Appendix VI
Participant Profile Sheet

Interview	**Participant Response**
Date of interview	
Participant's name	
Job Title/Grade	
School/Faculty	
Please indicate highest qualification (by ticking appropriate circle)	○ higher diploma ○ ordinary degree ○ honours degree ○ masters ○ professional qualification ○ doctorate
Gender	○ Male ○ Female
Age range	○20-25 ○26-30 ○31 -35 ○36-40 ○41-45 ○46-50 ○51-55 ○56-60 ○61-65 ○66+
Other than the Institute have you worked in other HEIs?	
How long have you worked in the Institute? Any other role/s in the Institute other than current?	
Outside of HEIs have you worked in other types of organisations (e.g. voluntary, not for profit, commercial, professional body)	
Membership of professional bodies or interest groups (both internal and external, formal or informal)	

Appendix VII

Interview Guide

Checklist/reminders:

1. Spare copies of Consent Form, Participant Information Sheet, Participant Profile Sheet
2. Tape recorder (plus backup recorder)
3. Tapes
4. Spare batteries
5. Switch off mobile

Prior to beginning interviews - all participants

1. Remind participants of purpose of research study.

2. Signing of consent forms (give participant copy to retain).

3. Collection/completion of Participation Profile Sheet.

4. Arrangements in respect of forwarding transcript and reminder to participants that they are free to amend it.

Main categories for discussion	***Some indicative subcategories are outlined below but based on your experience you are free to make additional suggestions***
Why did you become involved in working with an employer/s?	What has influenced your interests and beliefs around programme development with employers
Your experience of programme development when working with an employer	Academic knowledge, theory versus practice, developing the programme, partnership, accreditation, structures and processes (both formal and informal) involved in programme development, academic development, etc.
Your experience of programme delivery when working with an employer	Selection of students, admission criteria for students, teaching methods, issues around staffing (teaching), assessment, progression, structures and processes (both formal and informal) related to delivery, academic staff development, supports in the workplace, etc.
Reflections/suggestions in respect of developments in policy and practice in the development and delivery of programmes with industry.	For example, on understanding of WBL, employer partnership, accreditation, enhancing the linkage of theory and practice, academic staff development, resourcing, supports, etc.

Functional Participants:

1. Where does engagement with industry in the area of education fit with the Institute's mission

2. What would do you see are the benefits for the Institute and academic staff in respect of engagement with industry

3. How does the Institute support academic staff to remain contemporary and engage in the activity

4. How does the Institute recognise academic engagement with industry

5. How does the Institute support engagement with industry (staffing, practical supports).

6. Recruitment of academic staff – has there been a shift in policy favouring the recruitment of academic staff predisposed towards pursuing research

7. Reward/Payment to academic staff engaging with industry and financing of the activity – what are the issues.

Functional Participant (QA) reminder –(i) get background to the Institute's historical involvement with industry) (ii) history and background to development of partnering with industry on WBL (iii) QA issues surrounding partnerships.