Professional Learning and Development in Schools

Anna Reid · Madeleine Abrandt Dahlgren Peter Petocz · Lars Owe Dahlgren

From Expert Student to Novice Professional



Professional Learning and Development in Schools and Higher Education 5

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Volume 5

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ISBN 978-94-007-0249-3 e-ISBN 978-94-007-0250-9 DOI 10.1007/978-94-007-0250-9 Springer Dordrecht Heidelberg London New York

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Printed on acid-free paper

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Chapter 1 What's Happening in Higher Education?

What This Book Is About

Students entering higher education expect that their studies should lead them towards some form of professional career. They come to university with a range of expectations for their learning as well as for the outcomes of their learning. In this age, when complex internationalised professions are the main source of work for graduates, students need to prepare themselves for a future that can be volatile, changeable and challenging. Our overall aim in this book is to show how students navigate their way through learning and become effective students and how they shift the focus of their learning away from the formalism associated with the university situation towards the exigencies of working life. In this sense, we explore how people move from being expert students to novice professionals starting to establish themselves in a profession. When a person is an expert at something they are usually able to demonstrate an excellent skill or understanding, whilst a novice is usually a relative newcomer to an area who will undertake some sort of probation (articulated or not) before he or she can be fully embraced by the particular area. We look at how students become pre-professional experts, in the sense that they hold and demonstrate professional knowledge and dispositions and feel a personal interest and engagement with a specific discipline area that leads them into professional practice. However, when these expert students finally make the transition to working life their professional expertise is subsumed as they take on a novice role in the work place. So, we consider how students make this transition from expert to novice and perhaps back again.

To support the ideas presented in this book, we will utilise a decade of research undertaken in countries half a world away from each other – Sweden and Australia – and use the combined outcomes to present a model of professional learning. Rather than building our theory out of our own common experience, we use empirical research gathered from students and teachers to show how students negotiate the forms of professional knowledge they encounter as part of their studies and how they integrate their understandings of a future professional world with professional knowledge and learning. As students move from seeing themselves as learners, they take on more of a novice professional identity, which, in turn, provides a stronger motivation for their formal studies.

Our book presents an epistemology of professional formation in the form of a model which combines cognitive and affective dimensions of knowledge and learning. Simply put, the model is an empirically-based interpretation of how contemporary professional discourses, professional knowledge and professional dispositions interact and influence the development of students' professional identities. Moreover, the book frames empirical observations by summarising and analysing contemporary theories about the role of higher education from a societal perspective, as well as its significance for the development of individuals.

In this chapter, we set the scene for our investigation of learning for the professions. We discuss historical perspectives of higher education in the early twenty-first century within current frames, such as the massification of university education, the emergence of the university of the professions (as opposed to the university of scholarship), and the international context of higher education and learning for a professional life (including perspectives from other cultures). We also look at the blurring of the boundaries between learning at university and learning at work, the development of ideas of communities of practice (Wenger, 1998) and their manifestation using modern communication technologies, and continuing professional development. We discuss the diverse nature of students and how individuals can be seen as both representative of particular groups - such as those of different ethnicity, gender or professional area - and as individuals who have a unique experience which relates to their personal approaches to working life. We look towards the future and speculate about anticipated changes as the status and hence the power of universities is eroded and replaced by knowledge development in professional workplaces (Boud & Garrick, 1999) and continuing cycles of re-learning and re-skilling for professional workers. We conclude the chapter by exploring how higher education now focuses on the development of the "expert student" and suggest how research and pedagogical activities may support students as they make the transition from formal study into work as a "novice professional".

Learning for the Professions

Learners are the primary concern of higher education. Being involved in higher education is usually seen as a means of developing particular disciplinary knowledge, ways of thinking about oneself, thinking about the social and professional world, and a means of developing the capacity to be part of the world of professional work. The concepts and practices surrounding higher education in regard to these important learner concerns have changed considerably in the last 20 years. The massive increase in the number of universities in the late twentieth century points towards the importance of including diverse disciplines within the academy. The development of technical schools in the post-war period into the 1960s paved the way for their incorporation as modern technological universities in the late twentieth century. This, in turn, pushed the boundaries of what was possible for university education. The

previously-dominant liberal arts universities made way for, and incorporated, more technical and professional discipline areas.

In the early twenty-first century, most Western countries were left with uneasy relationships between long-established and well-funded universities and their relatively younger siblings. Regardless of the institution in which students find themselves, there is a commonality for learners in that they generally expect that their degree will prepare them in some way for their future life and aspirations. Some students will still adopt the liberal arts attitude, where they will expect to learn something about themselves which will enrich their possible futures. Other students will expect to acquire a range of skills associated with a particular profession to enable a quick movement into working life. Yet others anticipate learning what a particular profession is like with the expectation that they can then fluidly use their professional skills and knowledge in a professional workplace. In this sense, we now wonder what it is to be a professional. Is it about coming to know what a specific profession is about? Is it about developing the skills of a particular profession? Is it about acquiring and understanding a professional body of knowledge? Is it about taking a *personal stance* in relation to a profession? Is it a way of behaving? Or a way of *thinking*?

Entering an educational program in higher education can be seen as the start of a trajectory of professional formation, which includes both the appropriation of a body of knowledge and of the history, social practices, skills and discourses that are part of the respective discipline or profession that is studied. The role of higher education in society, as well as its traditions regarding knowledge and learning, has been debated intensely (for instance, see Barnett, 1994). The hegemony of higher education through the double role of both producer and conveyer of knowledge has been questioned, and the debate has to a large extent focused on whether higher education prepares students in a relevant way in relation to the demands of working life.

Previously, a first degree could lead to work within a specific sector that was likely to be the only discipline area in which a graduate would work for their lifetime. Knowledge was conceived of in a rather static way, in which the content of a degree would be received at university and used at work. In the twenty-first century, knowledge is seen as something rather more malleable, developmental, personal, integrated, work and leisure related, and so on. Hence, students' understanding of the nature of knowledge in their discipline is an epistemological concern, and students' understanding of themselves as constructors and users of knowledge is rather an ontological concern. Obviously, these two orientations involve each other – one focusing on the notion of what the learner knows and the other on who the learner is. The natural orientation of a university is to focus on the students' accredited learning outcomes, or what learners know. However, it seems more likely that the natural orientation of students is a focus on who they are becoming as well as on what they know. Learners entering higher education expect that their studies should lead them towards some form of professional career. They want to take on an identity that says "I am becoming a lawyer". The university contributes to this identity formation through a focus on epistemological concerns – what a student is coming to know – and on the nature of knowledge in a particular field.

The Contribution of Formal Learning Situations to Pre-professional Learning

Universities set up expectations of specific learning outcomes which are tied to curriculum and sometimes to a university's mission statement. Such a mission statement may show that the institution is oriented towards the liberal arts, or to technology, or to social justice, for instance. These statements influence the sorts of curricula that are developed. However, the curriculum is developed over time by academics with specific disciplinary and professional knowledge. Student learning is then usually assessed against the aims of the overall curriculum and may be at odds with students' own learning intentions and outcomes.

In some world regions, such as in Europe with the Bologna process (Keeling, 2006), universities try to harmonise course outcomes and length of study opportunities to enable the quick recognition of student qualifications from country to country. University-devised learning outcomes focus to a large extent on providing a means for students to demonstrate the acquisition or mastery of a particular body of knowledge that is deemed to be appropriate for specific professional areas. That body of knowledge is traditionally derived from academics' affiliation with a particular profession, developed by research in the field and discussion with others, and mediated through the university's course approval requirements. In this regard, knowledge in a particular area is usually presented as a bound set of requirements. Course notes and unit outcomes, the learning and teaching approach, assessments and examinations, and general discussion amongst the student body, all combine to provide for students a picture of what constitutes knowledge in a particular area. However, there is only a small amount of research that reports on how students experience and respond to this kind of knowledge package.

In addition to the contained knowledge sets that are presented to students, many universities attempt to add value to students' experiences at university by publishing a list of generic skills (such as communication, teamwork or ethics) that may be encountered during their studies. Depending on the context, these skills may be directly addressed within specific courses, or simply assumed to be adopted in the general course of education. Increasingly it is suggested that the reason for including these types of skills is to ensure that graduates are more employable, and that future employers demand their skills. Although there are some exceptions (some of which are the focus of Chapter 5), it is mostly the "easy" generic skills (capabilities, attributes) that are the focus of development at university. For instance, it is relatively straightforward to put together learning activities that foster group work and competencies related to group work can readily be observed and assessed (Dyball, Reid, Ross, & Schoch, 2007; Michaelsen, Bauman Knight, & Fink, 2002). However, in a broader context, some curriculum approaches (such as problem-based learning) foster a more integrated means of developing students' generic capabilities. Thompson, Treleaven, Kamvounias, Beem and Hill (2008), for instance, recognising that the more challenging generic skills are less well understood by teachers as possible curriculum inclusions, developed an on-line assessment system where word stems were used to stimulate teacher thinking about the way in which such skills are

included in assessment tasks. Barrie (2007) suggests that there are no uniform ways in which teachers understand these types of skills or attributes, but rather, "they vary in terms of the nature of the outcomes, ranging from atomistic, low-level technical and personal skills, to holistic interwoven abilities and aptitudes for learning" (p. 440). Consequently, teachers and students were encouraged to consider the relationships between generic capability and discipline knowledge and activity. Despite these instances, there is very little research that looks at how students experience and understand these skills in relation to their future professional work. So, how do students understand key generic skills for their professional formation?

The Contribution of Learners to Pre-professional Learning

These two important epistemological orientations in higher education – curriculumbased knowledge and generic skills - constitute only a part of students' overall experience of learning. Students come to university with a range of expectations for their learning, as well as for the outcomes of their learning, that move beyond those that are formalised. In this regard, students arrive with an idea about the value of their university study for their futures. They may have family or friends, or teachers, or television shows that provide them with a picture of what their possible professional future could be like. This picture is further developed and altered by the view of the profession presented through the curriculum: and university life is only one aspect of their experience, which combines with formal and informal general life experiences. These combined experiences afford a means through which students develop an idea of themselves as learners, workers, professionals, friends and collaborators. In other words, students' main learning outcomes are usually not those things that can be solidly accredited by the university, but those things that relate to the core internal value of the student – their identity. The notion of identity is not an easy one to untangle. For the purpose of this book on learning, we view identity as multifaceted, and acknowledge that awareness of one's own identity is also related to the situations in which people find themselves. For instance, while sitting in a university class, identity may be construed as a learning identity, as a communicative identity, or as a social identity. This is not a typically psychological view, but rather one that recognises identity transformations. In later chapters, we will see how students talk about their changing perceptions of identity as they travel through different life experiences. So, how do we know how students understand the notion of identity in relation to their aspirations, studies, professional work, and social life? In other words, taking an ontological perspective, who are these students becoming? These questions form the basis of discussion in Chapter 6.

Discourses of Higher Education and Working Life

There are several discourses that compete and complement each other as they constitute the backdrop for the ideas about pedagogies for professional learning discussed in this book. Dahlgren's team (Dahlgren et al., 2005) have previously defined four

discourses that are discernible in the literature and that have influenced the debate about higher education and its relation to working life. The first discourse concerns the call for knowledge production as a joint enterprise between universities and the surrounding society. The hegemony of universities has been challenged (Gibbons, Nowotny, & Schwartzmann, 1994), since knowledge is no longer produced only in university settings but is also increasingly found in a range of different locations such as government and industrial laboratories. Governments in the twenty-first century have promoted an enhanced role for universities, and at the same time have emphasised the importance of studying the relationships between university, industry and government as a "triple helix" (Etzkowitz, Webster, Gebhardt, & Cantisano Terra, 2000). Etzkowitz's group claimed that in the knowledge-based economy, universities are critical components for innovation, since they act both as human capital providers and seed-beds for new companies. The call for joint knowledge production between universities and the surrounding world can be interpreted as challenging the local practices of everyday university life to move towards performance determined by the market economy rules. During the first decade of the twenty-first century, we see this coming through as a global trend regarding changing systems for the governance and funding of universities, modelled on a performance-based market economy. The lack of stable forecasts about the nature of future tasks in working life and the qualifications needed for them makes the issue of feasibility of study programs, the requirements in working life and the relationship between higher education and working life complex (Barnett, 1994, 2000b). In a Swedish state survey on the new conditions for learning in higher education and the requirements for the twenty-first century (SOU, 2001, p. 13), it is argued that work in qualified positions in contemporary working life requires, in addition to specific knowledge and skills, general abilities of independent learning and an ability to formulate, analyse and solve problems. We will return in Chapter 7 to a discussion of how pedagogies for professional learning could prepare graduates to achieve such capabilities, needed for professionals the changing world of work.

The second discourse, Dahlgren argues, comprises the call for new research perspectives on the relationship between higher education and work. The relationship between higher education and working life is an area of research that has attracted increasing interest among researchers in recent years. Brennan, Kogan and Teichler (1996), in their review of research on the transition from higher education to working life, found that the research has predominantly concerned either the systems level, with a focus on the match between the output of higher education and the societal demands for academically-trained personnel, or studies on the expediency of higher education as assessed retroactively by novice professionals. They argue that the transition is often described in rather general categories, and there is little concern about the experienced impact of the education or the specific work task requirements.

The third discourse concerns the call for contextualising the research on higher education within the experiences of the students. A more recent review of the field by Johnston (2003), points out that there is still little information in the research literature on graduate employment from the graduates' own perspective. There is a

need for research focusing on experiences of graduates in their early employment years, she argues, particularly as regards their working conditions and culture. Other areas where she identifies a need for more research include the relationships between higher education and work, fulfilment issues such as the nature and extent of graduates' job expectations, satisfaction and commitment, and relationships between employers' and graduates' expectations. In this book, we are basing our arguments for pedagogies for professional learning on empirical studies of students' and graduates' experiences of their educational programs in a broad array of disciplinary and professional fields within higher education.

Dahlgren's fourth discourse constitutes a call for alternative pedagogies to equip students in a better way for the transition between higher education and working life. In the following sections, we will look at how differences in ontological and epistemological standpoints impact on students' experiences of their study program, their ideas of the nature of knowledge and their learning process.

We would also propose adding a fifth discourse to Dahlgren's four, that of professional discourse and students' understanding of their future profession. This suggests a dialectic where the way the profession is represented becomes a part of students' knowledge *of* the profession and contributes to their orientation for learning *about* the profession. This is the focus of Chapter 3.

There has been a shift in the understanding of students' transitions from higher education into working life. Recognition of these transition problems has brought about a number of new designs and pedagogical approaches within higher education, such as project-oriented education and problem-based learning (PBL). In the last two decades, there have been several attempts at collating the research on the impact of PBL through extensive literature reviews and meta-analyses (Albanese & Mitchell, 1993; Vernon & Blake, 1993; Colliver, 2000; Dochy, Segers, Van den Bossche, & Gijbels, 2003). Abrandt Dahlgren (2000) and Abrandt Dahlgren and Dahlgren (2003) have also shown that ways of implementing student-centred pedagogies are affected by specific contextual factors and conditions of different fields of knowledge in higher education. These pedagogical factors will be addressed in Chapter 7.

Identity, Learning and Engagement

We take the position that students attend to who they are becoming and what they are coming to know as essential aspects of their student and pre-professional identities. We have some knowledge of aspects of identity formation from areas beyond higher education. Taylor (2008, p. 29) identifies four positions from other literatures: they comprise an identity that can be "taken on", where a person identifies with a particular practice and faithfully adopts given truths; an identity that is based on reflection and scepticism; an identity that is "co-constructed", where rational and non-reflective positions may coincide; and a continuously-developing identity that is constantly shifting through contact with different contexts and is indeterminate, partial and complex. These positions illuminate different aspects of identity formation,