Shaping the future of accounting in business education in Australia

Brendan O'Connell

Garry D. Carnegie

Amanda J. Carter

Paul de Lange

Phil Hancock

Christine V. Helliar

Kim Watty

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Professor Brendan O'Connell
RMIT University

Professor Garry D. Carnegie
RMIT University

Dr Amanda J. Carter
University of South Australia, RMIT University

Professor Paul de Lange
Curtin University

Professor Phil Hancock
University of Western Australia

Professor Christine V. Helliar
University of South Australia

Professor Kim Watty
Deakin University

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List of acronyms

AAA	American Accounting Association
AACSB	Association to Advance Collegiate Schools of Business
AECC	Accounting Education Change Commission
AFAANZ	Accounting and Finance Association of Australia and New Zealand
AICPA	American Institute of Certified Public Accountants
AQF	Australian Qualifications Framework
EQUIS	EFMD Quality Improvement System
ERA	Excellence in Research for Australia
HELP	Higher Education Loan Program
IAESB	International Accounting Education Standards Board
IES	International Education Standards
IFAC	International Federation of Accountants
IFRS	International Financial Reporting Standards
MOOCs	Massive Open Online Courses
NPM	New Public Management
TEQSA	Tertiary Education Quality and Standards Agency

About the authors

Professor Brendan O'Connell
RMIT University

Brendan has an extensive track record in both industry and academia having worked as an analyst and bond dealer with major investment banks and being employed in leading universities in the US, Australia and Asia. He has published widely on accounting education issues and ethics and corporate scandals. In 2015, he was President of the Victorian Division for CPA Australia and has been a member of the Victorian Divisional Council of that organisation since 2010. From 2002 to 2011, he was a Chief Examiner within the CPA program in Australia. He has also been a recipient of competitive research grant funding from the Australian Research Council and the Office of Learning and Teaching.

Professor Garry D. Carnegie
RMIT University

Garry is a Professor of Accounting and Head, School of Accounting at RMIT University. He has been employed in the Australian higher education sector since 1985 after gaining experience in the IT industry, professional accounting services and in the financial services industry. His published research appears in books and monographs and also in articles in respected journals in the fields of accounting, accounting education, accounting history, archaeology, companies and securities law, economic history, librarianship, museum management and public administration. He has been the editor (1996–2007) and is now joint editor (since 2008) of *Accounting History* and is the Chair of the Chairs of Accounting and Finance Forum. He has also been a recipient of Australian Research Council Large and Discovery grants.

Dr Amanda J. Carter
University of South Australia, RMIT University

Amanda is a Lecturer at the University of South Australia and an Associate of RMIT University. She has worked in higher education since 2002, and has extensive experience in publishing, project management and research collaborations across disciplines. She has a number of publications in accounting education, as well as sustainability and accounting history. She previously worked as an advisor to small businesses and entrepreneurs. Her research interests include: sustainability and governance, accounting education, accounting history and wellbeing. Amanda is an active member of professional accounting networks and works with transdisciplinary issues.

Professor Paul de Lange
Curtin University

Paul is currently Professor and Dean Teaching and Learning in Curtin Business School at Curtin University. He has published over 45 refereed articles and is a regular speaker at numerous international and national conferences. He is an associate editor of *Accounting Education: An International Journal* and has won and completed over $800,000 in external research grants in the last five years, including two Office of Learning and Teaching and one Australian Research Council grant. Paul is a well-connected speaker in demand with an international reputation and

since 2006 he has been an elected member of the AFAANZ Board of Directors and is the President for 2013–2015.

Professor Phil Hancock
University of Western Australia

Phil is currently Professor of Accounting and Associate Dean of the Business School at UWA. Phil is Deputy Chair of the CPA Australia Divisional Council in WA. He is a Fellow of CPA Australia, Chartered Accountants Australia and New Zealand and the Accounting and Finance Association of Australia and New Zealand (AFAANZ). He has published widely in accounting education and was the leader of the 2008 Australian Learning and Teaching Council funded project *Accounting for the Future: More than Numbers*. He is an Associate Editor of the *Journal of Accounting Education*. He has received a national Carrick citation for outstanding contributions to student learning and in 2013 he received an award for outstanding contributions to accounting education from AFAANZ.

Professor Christine V. Helliar
University of South Australia

Christine is the Head of the School of Commerce at the University of South Australia and holds a Bachelor of Science (Mathematics & Management Studies) from the University of London, and a PhD (Risk, Derivatives and Management Control) from the University of Dundee. Her research focuses on accounting education, financial reporting, corporate governance, risk, risk management and derivatives, auditing and management control. Christine has trained as a Chartered Accountant at Ernst & Young and worked in investment banking at Morgan Stanley, Hong Kong Bank and Citigroup. From 2003–2009, Christine was Director of Research at the Institute of Chartered Accountants of Scotland, where she focused on overseeing and conducting business relevant research. Christine is currently the chair of the British Accounting and Finance Association, an honorary member of CPA Australia and is a member of The Institute of Chartered Accountants in England and Wales, The Institute of Chartered Accountants of Scotland and Chartered Accountants Australia and New Zealand.

Professor Kim Watty
Deakin University

Kim is the Associate Dean, Quality Standards and Accreditation and a Professor in Accounting at Deakin University. She has published widely in her area of specialisation – accounting education – both nationally and internationally and has been successful in securing in excess of $1 million competitive research funding over the past decade. Kim has taught both undergraduate and postgraduate students in Melbourne, Singapore and Hong Kong and has received numerous awards for teaching excellence. She currently chairs the Learning and Teaching Network (Australian Business Deans Council) and the Program Quality and Assurance Committee (CPA Australia).

Executive summary

This multi-stakeholder investigation with a prospective focus and conducted 25 years after the Mathews Committee Inquiry has three aims:

- assess the current state of play of accounting in business education in Australia;
- focus on the key challenges, issues and opportunities faced by the accounting education sector; and
- develop feasible, innovative and productive ways forward to meet the many challenges faced by accounting education and to take full advantage of the opportunities identified.

The key themes embraced in the investigation are as follows: professional knowledge and professional skills of accounting graduates; the inculcation of professional values, ethics and attitudes into graduates; scholarly research and its role in accounting education, creating knowledge and informing practice; and technology and innovation in learning environments.

This study presents the findings drawn from interviews with individuals who are engaged actively in graduate recruitment and the ongoing professional development of accountants. These interviewees were drawn from four key stakeholder groups comprising small, medium and large professional services firms, other employers of accounting graduates, regulators, including the major professional accounting bodies, and accounting academics. The key findings indicate that the future of accounting, like other facets of society, is being transformed by technology and the future of accounting work will advance into new areas while retaining broadly its fundamental core knowledge areas. New entrants into this field will need to possess well developed professional skills on their entry into the profession and, in combination with evolving professional knowledge and a solid core of professional values, ethics and attitudes. In addition, they need to have an ability to create value as business and wealth advisors, interpreters and communicators of financial and non-financial information, and contribute to the strategic direction of organisations, in particular, and society, in general.

The findings of this investigation have resulted in the development of 17 recommendations designed to provide proactive strategies to meet the challenges presented and these are provided for higher education providers and accounting schools, employers, professional accounting bodies, and accounting students. While the main recommendations relate to accounting curricula and connections between academe and the profession, it is proposed that an *Accounting Education and Curriculum Change Network* be established to oversee any reforms, administered by the major professional accounting bodies with AFAANZ, and having membership drawn from higher education providers around Australia.

For accounting education this presents new and exciting challenges as curricula are transformed by key enabling technologies and the new realities of the profession in an increasingly globalised world. Programs and degrees will incorporate more real world experience and academics, by engaging more directly with professional practice through both teaching and research, will become cognisant of their instrumental formative role in the initial professional development of accountants. Studying accounting in the contexts in which it operates as technical *and* social practice will assist in facilitating improved educational experiences and outcomes.

Chapter 1: Setting the scene

Introduction

This investigation is prospective in nature, being concerned with the future of accounting education as a key component of business education in Australia. While its focus is future orientated, it is premised on a particular understanding of accounting education's past and an appreciation of its present state. Therefore, the investigation is necessarily concerned with contemplating, projecting and shaping the nature and condition of accounting education within the context of business education. For this investigation, accounting education is understood as delivering the initial professional development. Employers serve a key role in continuing the professional development of accounting graduates such as by means of in-house training, the sponsoring of professional programs and experiential activities through rotation across functions.

In this study, business is the wider arena in which accounting is conducted and in which accounting both serves and impacts organisations and society. While set in Australia, this study acknowledges the reach and influence of accounting in business education beyond the country's borders, particularly in the Asia–Pacific region, and based on the domestic and international operations of accredited providers of accounting education in Australia, which are accredited by the major professional accounting bodies. It is generally acknowledged that accounting education is not just concerned with producing future accounting professionals as business advisors, but that accounting qualifications are also seen as important in providing a broad introduction to a potential career in business or management.

It is now approximately 25 years since accounting education was subject to a comprehensive examination. While there have been a number of surveys[1], the last major investigation into accounting education in higher education in Australia was undertaken by the Mathews Committee (Mathews, Brown & Jackson, 1990), with the (now late) Professor Russell Mathews as the chair of the *Review of the Accounting Discipline in Higher Education*. Based on current trends and determinants and future predictions for the discipline and the tertiary education sector, it is therefore timely for this further broad-based, multiple stakeholder investigation into accounting education in Australia.

During the past quarter of a century, numerous key changes have impacted on, or are presently impacting on, accounting education, including rapid changes associated with globalisation (Poullaos, 2004; Phil, 2008; Zammuto, 2008; Parker & Guthrie, 2010), massification (Parker & Guthrie, 2010; Parker, 2012; Parker, 2013), technological innovation (Ellingson & Notbohm, 2012; Parkinson, Chew & Miller, 2012; Cameron & Dickfos, 2013; Delaney, Fletcher, Cameron & Bodle, 2013; Abed, 2014), and increasing consumerism (Lawrence & Sharma, 2002; Gross & Hogler, 2005; Tight, 2013). It is, therefore, timely to ponder the future of accounting education in Australia.

This chapter serves to set the scene for the investigation with the focus on the initial professional development of future accounting professionals within the realm of higher education. It commences with a brief exploration of the International Education Standards (IES) of the

[1] These surveys have been concerned with specific issues such as graduate skills (see, in particular, Hancock, Howieson, Kavanagh, Kent, Tempone & Segal, 2009) or with a wide range of issues but having a narrow range of participants, for example, academics (Cappelletto, 2010).

International Accounting Education Standards Board (IAESB) and the adoption of key terminology applied in this study, which derive therefrom. It proceeds to outline an array of challenges and expectations faced by accounting education in Australia today and which may continue to impact or influence the shape of accounting education in the broader context of business education in the country. This chapter also specifies the aims of this study and elucidates a long-held regard within the accounting profession for the nature and quality of the accredited educational degrees that constitute the pathway for aspirants to enter the accounting profession. The chapter structure is also outlined.

International education standards

Internationally, accounting education is guided by the standards issued by the IAESB operating under the auspices of the International Federation of Accountants (IFAC). The role of the IAESB is to establish and maintain a set of standards that represent best practice in accounting and professional services firms (IAESB, 2014). Through their IFAC membership, Australian professional accounting bodies, namely CPA Australia and Chartered Accountants Australia and New Zealand, include the standards in their accreditation processes and requirements (CPA Australia and the Institute of Chartered Accountants in Australia, 2012)[2].

The IES encompass all aspects of accounting education. Tertiary accounting education, such as that discussed in this study, is classified as initial professional development[3] (IES Framework 2014, paras 22–23) and is distinguished from continuing professional development. Five standards are related to initial professional development:

- IES 2 Initial Professional Development – Technical Competence;
- IES 3 Initial Professional Development – Professional Skills;
- IES 4 Initial Professional Development – Professional Values, Ethics and Attitudes;
- IES 5 Initial Professional Development – Practical Experience; and
- IES 6 Initial Professional Development – Assessment of Professional Competence[4].

For this study, IES 2, 3 and 4 provide the basis for the terminology used in this investigation as the accounting education literature provides an array of terms used as synonyms. Thus, for consistency, the terms used in the standards and their meanings are used. To this end, the terms are professional knowledge, professional skills, and professional values, ethics and attitudes (see, Appendix A for more details).

Other terms[5] may be used to describe the knowledge, skills and values as articulated in the IES. Professional knowledge, for example, may be referred to as technical knowledge or technical accounting tasks (see, for example, Hancock, Howieson, Kavanagh, Kent, Tempone and Segal, 2009; Guthrie, Evans and Burritt, 2014). Skills such as communication, problem solving, critical thinking, negotiation and team work have tended to be combined and given various terms, including generic skills (see, for example, Hancock et al., 2009), soft skills (see, for example, Hall, Agarwal & Green, 2013), non-technical skills (see, for example, Evans, Burritt & Guthrie, 2010;

[2] The Institute of Public Accountants separately accredits accounting degrees that have been previously accredited by CPA Australia and Chartered Accountants Australia and New Zealand.
[3] CPA and CA programs are included in initial professional development but are not included in the scope of this study.
[4] The IES are under regular review. The standards drawn from the 2014 Handbook are used for this investigation. The revised standards take effect on 1 July 2015.
[5] Other terms are used only where they are included in a quote.

CPA Australia and the Institute of Chartered Accountants in Australia, 2012). As such, these skills are transferrable across fields and positions. They are distinguished from professional values, ethics and attitudes, which speak to the conduct of individuals as professionals. Skills are typically developed, whereas values, ethics and attitudes are inculcated.

Challenges and expectations

There is an array of challenges and expectations faced by the accounting profession in general, and by accounting educators in particular, in tertiary education settings. The accounting and business landscape in Australia has been characterised by increasingly contested markets with competitiveness eroded in recent years by an appreciation of the Australian dollar against other major currencies combined with a shift offshore for many traditional financial services roles (Terjesen, 2010). Such trends have tended to reduce the pool of positions for accounting and business graduates. The breadth and depth of the skills of accounting graduates are often called into question, particularly the adequacy of their professional skills, for graduate accounting positions. New graduates are expected to possess a broad set of skills extending beyond professional knowledge to include professional skills such as teamwork, leadership potential, communication and interpersonal skills (Jackling & de Lange, 2009). Hence, commencing their employment in challenging or diverse roles may stretch the graduates. They may often expect to take on more responsibility during their initial employment than may have been traditionally the case (Hancock et al., 2009). More recently, Elder (2015, p. 10), in commentating on 'the rise of soft skills' with a focus on the accounting profession, listed the following skills of the genre: 'emotional intelligence, communication skills, conflict resolution and creating win–win outcomes via collaboration rather than compromise'.

Domestic enrolment in accounting degrees is static or declining, with accounting not widely regarded as an attractive study choice in secondary schools. Recently, the demand for accounting and business degrees has been volatile in the international student markets (Laswad & Tan, 2014). This can be attributed to a variety of factors including changing expectations about career prospects, currency movements, additional visa requirements, concerns about safety in some locations, and increasing competition for students stemming from other countries, such as the USA, UK, Singapore and, in more recent times, China. Many international students, on the completion of academic degrees with majors or specialisations in accounting, have struggled to secure full-time graduate accounting positions in the Australian accounting profession and within business on a timely basis (Arkoudis, Hawthorne, Baik, Hawthorne, O'Loughlin, Leach & Bexley, 2009). The result is that some graduates are working in a raft of lower paid non-accounting or non-business roles, para-accounting roles or returning to a Master-level degree in other disciplines, such as finance or marketing, to broaden or diversify their skills (Birrell & Rapson, 2005; Birrell, 2006).

Cappelletto (2010), based on findings from a survey of Heads of Departments or Schools of Accounting and accounting academics, emphasised four challenges to accounting education:

- the vulnerability of university funding models particularly related to international income;
- falling numbers of domestic students and the impact of international student enrolments;
- unmet demand for accounting graduates and issues such as poor communication skills; and
- the ageing profile of accounting academics.

Freeman, Hancock, Simpson, and Sykes (2008) also identified several key problems within the provision of accounting education, including the following:

- very large classes, with students drawn from a diverse range of disciplines and cultural backgrounds;
- chronic staff shortages, which are expected to worsen in the coming years given the ageing demographic of staff;
- lack of well-honed written or oral communication skills, particularly, but not exclusively, among international students; and
- tensions in the discipline arising from the number of pathways available for entry into the accounting profession and the potential challenges this creates for higher education accounting degrees.

Hall et al. (2013), on analysing the broad management education landscape, addressed the rise of international accreditation by means of the development and revision of IES of the IAESB as well as new quality assurance regulators, particularly the Tertiary Education Quality and Standards Agency (TEQSA), including the potential for innovation by business schools to be stifled by such standardisation forces. Challenges have also arisen from technological advances and the rise of online education offerings, including massive open online courses (MOOCs), the increasing use of social media such as Twitter and Facebook by students and business alike, and that the traditional classroom format of lectures and tutorials is increasingly being "flipped"[6] by the resources now available online (Evans, Burritt & Guthrie, 2013).

The standing of accounting research relative to other more established university disciplines is also perceived as being, at least potentially, under question or threat (Swanson, 2004; Clarke, Flanagan & O'Neill, 2011), which may result in some accounting schools[7] being converted, at certain universities during the coming years, to teaching-only status or professional schools. A factor that may contribute to this development relates to the argument that Commonwealth Grants Scheme funding should be for teaching activities only (Hare, 2014). The notion of teaching-only departments or schools may seem to be appealing to some who believe that this would lead to an increased emphasis on teaching excellence in accounting. However, it may also result in a general lowering in the value of accounting degree qualifications, a reduced emphasis on knowledge creation in accounting with wider implications for the status or legitimacy of the profession itself, a lessening of the importance of the teaching–research nexus in education, and a return to a focus on developing professional knowledge in a similar way to that which commonly occurs in the vocational business education sector.

Research has documented many similar concerns globally. A prominent US report concluded that accounting education had a perilous future, with demand for accounting majors decreasing dramatically (Albrecht & Sack, 2000). More recently, the *Pathways Commission on Accounting Higher Education*, created in 2009 by the American Accounting Association and the American Institute of Certified Public Accountants (AICPA) to study the future structure of higher education for the accounting profession, arrived at a similar conclusion. It concluded that often students in

[6]Flipped learning is a pedagogical approach to teaching in which lectures are replaced with online audio-visual materials and class time dedicated to active learning methods. Students are expected and required to engage with the audio-visual resources and readings to prepare for face-to-face classes and thus achieve greater collaborative learning outcomes (Roehl, Reddy & Shannon, 2013).

[7]Accounting at any individual institution may be a discrete school or a department within a larger business school or faculty. For the purpose of this study, the term 'accounting schools' is used to refer to both.

accounting classes are exposed to technical material in a vocation-focused way that is disembodied from the complexity of the real world[8], that the latest technologies used in business were not adequately utilised in the classroom, that there was a significant disconnect of accounting research from practice and that there was not enough focus on excellence in the classroom relative to research (Pathways Commission, 2012).

Aims of the study

The challenges and expectations briefly outlined above occur against a backdrop of proposed changes to higher education policy by the current Australian Government elected in late 2013. The Minister responsible for higher education, the Hon. Christopher Pyne, has heralded a return to the Menzies tradition of higher education – central to this tradition is responsibly exercised academic freedom, institutional autonomy and a removal of regulatory constraints and burdens[9] (Pyne, 2014, p. 18). Whether these higher education reforms will occur during the remaining term of the current Federal Government is unclear at the time of writing. Indeed, legislation was introduced into Parliament in late August 2014 and has since been defeated twice in the Senate.

The key aims of the present investigation are to:

- assess the current state of play of accounting in business education in Australia;
- focus on the key challenges, issues and opportunities faced by the accounting education sector; and
- develop feasible, innovative and productive ways forward to meet the many challenges faced by accounting education and to take full advantage of the opportunities identified.

As Australia's largest and earliest professional accounting body, with its earliest antecedent body – The Incorporated Institute of Accountants, Victoria – dating to 1886, and as one of the world's largest professional accounting bodies, CPA Australia has a vital interest in assisting to ensure the quality and relevance of accounting education in the context of business education. The quality and relevance of accounting education impact upon the ability to attract the best and brightest to study accounting degrees as well as producing graduates who possess the desired array of skills for successful careers in accounting and business. Supported financially by CPA Australia under its public interest charter, this study is concerned with enhancing the state of accounting as an instrumental discipline within business education. This initiative is intended to serve and support the business sector that has a vested interest in the state and future potential of accounting education and the capabilities of accounting graduates in general. Finally, this interest is linked

[8]According to Carnegie and West (2011, p. 499), 'studying the "real world" contexts of accounting can be as revelatory and exciting – and maybe sometimes also as discomfiting – as the experience of a biology student progressing from a textbook diagram to the dissection table'.

[9]Prior to the release of new policy, the National Commission of Audit (2014) set out recommendations for the future funding of higher education in Australia. Central to this is an increase in the contribution by (domestic) students towards their education. The Higher Education Loan Program (HELP) introduced in the 1980s as part of a reform of the sector, recoups 40 per cent of tuition fees. The recommendation of the National Commission of Audit is that student contributions should rise (National Commission of Audit, 2014, p. 153). More recent policy announcements indicate that a radical restructuring of higher education, including opening the sector to US-style provision, is likely (Maslen, 2014; Trounson, 2014). This infers that higher, deregulated fees are likely and, combined with lower income thresholds for repayment of HELP debts and higher rates of interest (Hare & Lane, 2014), will make a tertiary education more expensive and potentially limit access to people from lower socio-economic backgrounds. Furthermore, the new policy embraces the expansion of tertiary education funding (through the Commonwealth Grants Scheme) to include private providers (*The Australian*, 2014). Pyne (2014) has argued that the opening up of competition for government funded places in the sector to private providers will mitigate fee rises (see also, Etherington, 2014; Hare & Lane, 2014).

inexorably to strengthening governance, accountability and sustainability within the Australian business sector, both in the profit and non-profit sectors, for international competitive advantage (Enright & Petty, 2013).

A tradition of concern for reform

This study is not the first of the genre and follows a long global tradition of such inquiries in the accounting profession. The education of the entrants to, and the constituents of, an occupational group that is a member of the professions, is regarded universally as a just and worthy concern. Accounting, as a worldwide and prominent profession, is no exception. There exists a tradition of concern for accounting education reform. On the other hand, there is also a general awareness that the pace of change of accounting education is slow with accounting often being taught with a focus towards mere technical practice, rather than a dynamic social practice as well as a technical practice.

Since at least the 1950s in the USA, and in Australia from at least the mid-1980s, periodic calls for reform of accounting education have been made and a range of inquiries have been conducted in response to such calls. Such key inquiries will be reviewed in the next chapter. Notwithstanding such calls for reform, the content of education for accounting professionals has occupied the minds of authors publishing in scholarly journals since well before the 1950s. In Vol. 1, No. 1 of the *Journal of Accountancy*, Sterrett (1905) outlined a definition of accountancy and his assessment of the knowledge and skills that were required for success in the then emerging profession (at a time when the role was widely perceived to be undertaken by men). Sterrett (1905, p. 3) stated:

> Accountancy is, or soon will be, pre-eminently the profession of business advice, and the accountant, if he rises to his professional responsibilities, must be a man who is thoroughly conversant with the principles underlying the conduct of successful business enterprises, and who has accumulated a large fund of information in matters of business policy.

Sterrett (1905, p. 1) also outlined his preferred content for accounting education, which would contribute to success in the profession at the time when only 'perhaps two of the larger universities' in the USA were providing a 'professional education in the field of accountancy' (p. 1), 'notably in New York University and in the University of Pennsylvania' (p. 12). He wrote (1905, p. 15):

> To the young man [sic] whose aspirations lead him toward this young profession, what better word can be said than to urge upon him, first of all, to obtain the best general education within the compass of his means and opportunities, to follow this by university training in the study of accountancy and its allied branches, and finally to supplement his study by attaching himself to the office of an accountant having an extensive general practice?

The Accounting Review, published since 1926, highlights the longevity of the accounting education discussion and debate. In its opening volumes, topics covered included the teaching innovation of the so-called Harvard Case Method, which was viewed as a substitute for practical experience (Jackson, 1926a), as well as the tendencies represented in the then current commercial/business education (Jackson, 1926b), the growth of business schools in the USA (Newlove, 1926), and the ways in which universities could be of service to the profession (Belser, 1927). Indeed, in 1927 Loeb explored the position of accounting in business education stating that a 'course in elementary accounting develops accurate methods of thought; it is no more vocational in character than English or mathematics and it should be accepted equally with those subjects for the degree of Bachelor of Arts' (p. 46).

By the 1940s, education remained a prominent topic in this journal (see, for example, Bauer, 1942; Littleton, 1942; Massell, 1945; McMahan, 1946; Dohr, 1948; Budd, 1948; Smith, 1948). Littleton's (1942) exploration of the meaning of accounting education is remarkably similar to that of today's debate – the right mix between coursework (vicarious learning) and practical experience (personal learning).

In the late 1950s, there started in the USA what would turn out to be a series of broad-ranging inquiries into accounting education (Heaton, Herbert, Kell, Warner, Zlatkovich & Wyatt, 1959; Bedford, Batholemew, Bowsher, Brown, Davidson & Horngren, 1986; Pathways Commission, 2012). Yet, despite this long-lived agenda, there has been a lack of *genuine* widespread reform of accounting education (Boyce & Greer, 2013). In their proposal to improve accounting education, Chabrak and Craig (2013, p. 91) 'urge accounting educators to encourage imaginings and critical thinking in their students'. In commenting on the initiative and approach of Chabrak and Craig (2013), Carmona (2013, p. 113) observed that 'calls for the reform of the accounting curriculum have been rather unsuccessful' (see also, Merino, 2006). The author suggested that rather than wait patiently for some grand reform of accounting education, which is seemingly unrealistic, an individual approach to changing the accounting curricula to this important issue is sound. What Carmona (2013, p. 117) meant by an individual approach is summed-up in the question he poses: 'What can individual faculty members do to pursue the goal of accounting reform?' Put differently, Carmona was effectively asking: what can accounting educators do for accounting education reform as opposed to what can accounting education reform do for accounting educators? This constitutes a bottom-up rather than a top-down approach to reform and resembles the *think globally, act locally* mindset that underpins calls and actions targeted at the sustainability of the planet. On the other hand, this individual initiative approach to developments in accounting education may run counter to the impacts of recent key changes in accounting education, which are intended to largely standardise the accounting curriculum across nations or regions, including the outcomes of the Bologna Process[10] in the European Union and the IES in accounting.

Structure of the study

Chapter 2 provides an overview of the findings of major Australian inquiries into accounting education since the mid-to-late 1980s, as well as an overview of the findings of key international studies, especially those undertaken in the USA and Europe. Chapter 3 outlines the methodology underpinning the interviews undertaken in conducting this study with individuals who are engaged actively in graduate recruitment and the ongoing development of professional accountants, drawn widely from the accounting profession, commerce, business and the public sector, as well as prominent accounting academics, including Heads of Departments/Schools. Chapter 4 considers the institutional context of accounting in business education in Australia and reports the findings on government policy and stakeholders of accounting education. Chapter 5 explores the current state of professional accounting work, perceived changes expected in accounting work over the decade ahead, and identifies the challenges this presents to accounting education.

Chapters 6 to 9 address key themes embraced in the study, which are respectively: professional knowledge and professional skills for accounting graduates; transferring and inculcating

[10] The Bologna Process is an effort in the European Union to generate agreements across member nations to ensure the harmonisation and comparability of higher education qualifications. For more information see http://ec.europa.eu/education/policy/higher-education/bologna-process_en.htm.

professional values, ethics and attitudes; scholarly research and its role in education and practice; and technology and innovation in learning environments. These key themes were identified from a detailed review of the literature. Chapter 10 sets out the recommendations of the study and identifies related action points.

Chapter 2: Previous investigations into accounting education

Introduction

In light of the long-established tradition of concern for the reform of accounting education highlighted in Chapter 1, this chapter explores the background to this study, specifically in the form of the key findings of previous major inquiries into accounting higher education in Australia, the USA and Europe. Such inquiries are often conducted from within the accounting profession and are often commissioned or sponsored by professional and/or academic accounting bodies. Where commissioned by government, the inquiry panel most typically includes key representatives drawn from the accounting profession, including representatives of the accounting discipline within higher education institutions. Understandably, the interests of the accounting profession are important in conducting effectively such investigations. On the other hand, the tendency for introspection may emerge in certain investigations where much, or even all, of the evidence presented is gathered from the accounting discipline in the higher education sector itself. Such narrowly-focused inquiries tend to emphasise the problems in, or challenges facing, accounting education but may not adequately reflect the views of a wide variety of stakeholders.

The previous inquiries outlined hereunder, typically presume that accounting is a well-understood phenomenon. It has been long and widely understood that accounting is a technical practice or a comprehensive set of techniques, concepts and practices resulting in the preparation of accounting reports. However, this portrays accounting as a purely technical practice. Hopwood (1983, p. 290) advocated the study of accounting 'in the contexts in which it operates', arguing that accounting is not 'a phenomenon divorced from the social'. It is not 'a relatively independent art'; rather accounting 'can shape, mould and even play a role in constructing the setting in which it forms a part' (Hopwood, 1983, p. 288). This latter day conception portrays accounting as social practice where accounting is 'much more than an instrumental and purely technical activity' (Miller & Power, 2013, p. 557).

This more recent conception of accounting, which began to develop traction within the academic literature from the mid-to-late 1980s, focuses on the organisational and social roles of accounting. Accounting as social practice recognises the pervasive nature of accounting in organisations and society and the consequences, whether intended or unintended, of accounting emergence and accounting change in organisations, in particular, and more broadly in society (see, for example, Hopwood & Miller, 1994; Miller, 1994). Under this conception of accounting, accounting is recognised for its effects on the behaviour of people and, therefore, its *impacts* on organisational and social functioning and development.

In this vein, Bryer (2011, p. 479) labels accounting a 'learnt social practice', and describes it as 'a practice of human interchange … that can enable individuals to perceive their activity and its purpose collectively'. According to Miller and Power (2013, p. 558), 'if organizing without accounting is increasingly unthinkable today, accounting also makes organizing thinkable and actionable in a particular way'. Miller and Power (2013, p. 559) added '[in] making visible and calculable the objects and activities that are the heart of management, accounting creates a facticity that appears objective and unchallengeable, beyond the fray of politics or mere opinion'[1].

[1]Given the weight afforded to accounting and its outputs in guiding and ordering the affairs of individuals within organisations and society, attention has been given to the accountability of accounting in proposing particular reforms

Notwithstanding the advent of an understanding of accounting as social practice within the academic literature within the past two to three decades, the inquiries outlined below, including the investigations from the early-to-mid-1990s, have tended to portray accounting as a largely neutral, taken-for-granted technical practice.

Accordingly, the accounting that is generally presented for review and reform within the education sector is itself commonly presented as a relatively narrow technicist phenomenon to be mastered and properly applied. While the development of professional knowledge and professional skills is important, the wider behavioural consequences or impacts of accounting emergence and accounting change within organisations and in society have tended to be under-explicated in such inquiries, especially those conducted prior to the early to mid-1990s. As a result, potential opportunities for the broadening of accounting education to reflect a more balanced focus on accounting as technical *and* social practice have essentially been missed.

The inquiries outlined in this chapter share a common theme of calling for accounting graduates to be better equipped for the changing work environment. Specifically, a greater focus is needed on developing the professional skills of graduates, such as communication, critical thinking, conflict resolution and negotiation skills. However, workable solutions adequately to address these perceived deficiencies on a cross-institutional, whole-of-sector basis tend to be lacking in the reports emanating from these inquiries.

Australian inquiries into accounting education

There have been few broad-based and systematic studies into accounting education in Australia. The first of these was published in 1988 and was followed quickly by the most prominent inquiry – a Federal Government commissioned inquiry chaired by Professor Russell Mathews – the Report of which was published in 1990. In addition, a number of inquiries on a smaller scale have been conducted. The study prepared by Cappelletto (2010) is a notable work dealing with a range of issues with evidence being drawn from within accounting academe itself. In this investigation, views were sought from individuals who were, at the time of the study, engaged actively in graduate recruitment and the ongoing professional development of accountants, drawn widely from the accounting profession, commerce, business and the public sector, as well as from prominent accounting academics, including Heads of Departments/Schools.

An outline of each of these inquiries is provided below to elucidate some of the key concerns and issues that are the subject of this report.

Task Force for Accounting Education in Australia (1988)

In 1985, the Australian Society of Accountants (now CPA Australia), the Institute of Chartered Accountants in Australia (now Chartered Accountants Australia and New Zealand) and the Accounting Association of Australia and New Zealand (AAANZ) (now the Accounting and Finance Association of Australia and New Zealand or AFAANZ) combined to explore accounting education in Australia. The *Task Force for Accounting Education in Australia Report* was published in 1988 (hereafter referred to as Task Force, 1988). The decision to conduct this inquiry into accounting education followed the presentation of a keynote address by the President of AAANZ at the 1983 annual conference of the Association held at Griffith University. In this

for adoption, such as financial reporting reforms in the public sector (see, for example, Carnegie & Wolnizer, 1996; Carnegie & West, 2005).

address, Professor P.E.M. Standish characterised accounting education as standing 'at the crossroads' (Task Force, 1988, p. 1). This has become a common phrase used since then to describe accounting education both in Australia and overseas (see, for example, Evans et al. (2010), who referred to accounting education being 'at a crossroad'). As the first comprehensive inquiry into the state of accounting education in Australia, its terms of reference comprised five broad themes:

- to determine the identity and needs of the various users of accountants;
- to determine appropriate educational models for accounting education;
- to demonstrate the need for, and processes of, professional accreditation of accounting education degrees;
- to outline the resource requirements including human, financial and alternative sources; and
- to identify and explore institutional structures of the relevant qualifications (Task Force, 1988, p. iii).

At the time, a significant issue identified was whether the structure of three-year accounting degrees was meeting the various needs of the accounting profession as a whole and the identified eight categories of accountants[2]. The inquiry found that degrees were becoming too narrowly defined technically and were limited in their ability to develop sound foundational accounting skills and to expose students 'to the place of accounting in the broader social and economic context' (Task Force, 1988, p. 2). Of equal concern was a general failure of accounting degrees to equip graduates with skills in financial management compared to the technical and more formal recording techniques of the discipline. Given these concerns, the Task Force recommended that 'basic accounting studies should be the equivalent of four years full-time' (Task Force, 1988, p. iv).

A significant outcome of this inquiry was the identification of a common core of knowledge and a common body of skills that the completion of all accredited accounting undergraduate degrees should provide for students. Such skills should include 'communication, entrepreneurship, interpersonal relations, and organisational behaviour' (Task Force, 1988, p. 7). Students also require an 'understanding of the place of accounting in the managerial process' and, for many there would be value in undertaking elective studies 'in the humanities and social sciences, including foreign languages, sociology and psychology' (Task Force, 1998, p. 7).

Such was the emphasis placed on balancing the structure of the degree to achieve common knowledge/common skills, that an outline of an ideal degree structure was provided, which included suggested weightings to be attached to communication skills, quantitative methods and disciplinary knowledge for accounting, as well as economics and finance, legal structures, information systems design and use, and elective studies (Task Force, 1988, pp. 38–39).

The multi-dimensional development of skills for graduates is acknowledged as problematic: the competing demands for such development have crowded degrees. However, a commitment remained for accounting degrees to satisfy the needs for the development of:

- technical skills;
- a disciplinary perspective on accounting;

[2] These were identified in the study as professional accountants, para-professionals, auditing specialists, taxation specialists, external reporting specialists, management accounting specialists, treasury (and government) and insolvency and financial reconstruction specialists.

- problem-focused professional skills; and
- an appreciation of the importance of a research perspective in accounting (Task Force, 1988, p. 19).

Such development was recognised as needing 'an intensive relationship between teacher and taught' (Task Force, 1988, p. 20), to be delivered by workshop rather than by means of lecture. Student–staff ratios, which had been steadily rising over the previous decade, needed to be lowered, and funding/resourcing and the cross-subsidisation of other disciplines by accounting, had to be addressed.

The condition of accounting research was also considered. While some research developments in accounting in Australia and in other countries were acknowledged, the number of accounting academics in Australia with 'strong research reputations' was considered to be 'relatively low compared with that found in most other academic disciplines' (Task Force, 1988, p. 31). One of the factors contributing to this state of affairs was the low proportion of accounting academics in Australia at the time who were research trained as evidenced by a PhD qualification.

The Mathews Report (1990)

Following the Task Force Report, the Federal Government commissioned a review of the accounting discipline in Australian higher education that was conducted by Russell Mathews (Chair), Philip Brown and Margaret Jackson. Their work culminated in the release of *Accounting in Higher Education: Report of the Review of the Accounting Discipline in Higher Education* in 1990 (Mathews et al., 1990). The review panel report, referred to hereafter as the Mathews Report, came to a variety of major conclusions and made a wide array of recommendations with respect to accounting education and research. It was concluded that the existing three-year undergraduate degree in accounting was failing to achieve three educational objectives, specifically stated as 'to provide a broad-based general education, to provide a specialised professional qualification to meet the membership requirements of the accounting profession and to prepare students for a career in business management' (1990, p. xxii). The extension of higher education accounting degrees from three to four years of full-time study was recommended, in line with an earlier recommendation of the Task Force (1988). This extension was proposed by means of the major Australian professional accounting bodies adopting this higher educational hurdle for membership at associate level. Despite the findings of the Mathews Report, the Federal Government showed no willingness to extend accounting education or increase funding (Evans & Poullaos, 2012).

Accounting had experienced unparalleled growth in the previous two decades following the adoption of an 'all-graduate' entry requirement for the professional bodies (Tippett, 1992). However, an 'evil star' (Tippett, 1992, p. 100), in the form of declining government funding, had resulted in an aggravation of the chronic under-resourcing of accounting. Student–staff ratios, which had always been higher than other disciplines, often as much as 40 per cent higher, ballooned, so that by 1987 this was often 50 per cent higher than other disciplines (Task Force, 1988, p. 25). Deakin University, for instance, had a student–staff ratio of 33.8:1 compared with 12.2:1 across the institution and 10.8:1 nationally. While the lowest ratio was at James Cook University (11.8:1), every university offering accounting undergraduate degrees had student–staff ratios that exceeded the institutional and national levels for other disciplines.

Financial deregulation policies for various industry sectors had resulted in a substantial increase in demand for accounting graduates but chronic under-resourcing and declining academic salaries meant not only were working conditions deteriorating, but there was insufficient staff to meet the demand for accounting graduates (Tippett, 1992). It is in the context of reforms to higher

education, declining staff numbers, increasing student numbers and concerns over the quality of teaching that Mathews, Brown and Jackson, as review panel members, were able to build on the work of the 1988 Task Force with the financial assistance and support of the Commonwealth Government.

The opening pages of the Mathews Report stated 'as a result of a long period of chronic neglect, the accounting discipline in higher education is in great need of support and revitalisation' (Mathews et al., 1990, p. xix). Individual higher education institutions had created this problem by failing to provide the appropriate/adequate resourcing for the discipline and encouraging significant growth in student numbers. The result was that the discipline was unable to maintain quality standards in terms of teaching and that staffing, accommodation and facilities had serious failings. Of note was the perception that accounting disciplines experienced discrimination at an institutional level; attracting large revenues that were subsequently used to cross-subsidise other, less lucrative, research-orientated disciplines. The Report outlined major findings across several areas.

- Student–staff ratios
  As with the Task Force Report, strong emphasis was placed on the high student–staff ratios in the discipline. The Report recommended an assessment of appropriate levels of contact hours (for students), class sizes, staff teaching loads and assessments in accounting and compared to other disciplines. It recommended a reduction in the ratio to 16:1.

- Staff shortages
  As a result of a rapid increase in international student numbers and poor salaries (compared to average weekly earnings), which encouraged a high turnover of staff and mobility between institutions, accounting education suffered from a lack of suitably qualified and experienced staff.

- Government funding and student expansion
  Government funding for higher education generally, and accounting education in particular, occupied a significant portion of the Report. The general position was that the Commonwealth Government had failed to adopt an equitable system of resource allocation. This situation was exacerbated by institutional usage of accounting departments/schools' revenues to subsidise other disciplines. The unbalanced funding models inhibited increased staffing in the face of increased student demand – and the accounting discipline, as stated in the Report, 'has been squeezed between the interplay of market forces and arbitrary planning and resource allocation' (Mathews et al., 1990, p. xix). The expansion of student numbers was accepted as being necessary for financial reasons but the educational impact was not being taken into consideration and funding from international students was not flowing into an improvement in the quality of teaching. There was a failure in managing such growth through the lack of appointment of additional academic staff. Hence, it was much more difficult to achieve educational outcomes comparable to other disciplines.

- Undergraduate curriculum in accounting
  The curriculum of undergraduate accounting education nationally was considered to be too restricted as a result of the requirements of the professional accounting bodies (and other accreditation bodies). Diversity of curriculum was considered a desirable feature as it would allow institutions to cater for the needs of students and employers more effectively. Accounting courses or units were recommended 'to become more conceptual and less procedural, while theoretical and empirical studies need to be better integrated and related

to practical experience' (Mathews et al., 1990, p. xxii). The further development of computing and communication skills was also recommended. Improvements in teaching accounting were also called for using innovative classroom techniques in an effort to make courses or units less routine, predictable and boring and, thus, more attractive to prospective students.

- Research performance of teaching staff
  At the time, the relatively weak research performance of accounting educators was considered a serious issue. While the Report acknowledged a few outstanding examples of staff who had achieved high international reputation as accounting researchers, it also stated that 'many accounting staff members lack any sense of intellectual curiosity' (Mathews et al., 1990, p. xxii). Efforts were required at both institutional and policy level to stimulate intellectual curiosity amongst academic staff members who were tasked to pass this curiosity on to their students.

- Consulting activity
  An increase in the involvement of staff in policy development through consulting was encouraged, especially if improvements to the staffing position occurred as was anticipated by the panel. Such activity was viewed as needing 'to be linked more closely to accounting teaching, staff development and research' (Mathews et al., 1990, p. xxiii).

The Mathews Report garnered relatively little scholarly attention at the time. In a special issue of *Accounting Education: an International Journal*, Tippett (1992) provided an historical perspective through outlining the events leading to the Report and the backdrop of significant policy changes in higher education. While Simon (1992) questioned whether the crisis, as characterised in the Report, was genuine, he noted the lack of government response. Macve (1992) described the Report as 'depressing reading' (p. 129) and noted that there had been criticisms of the Report, which some considered were a reflection of 'the strongly held views of Russell Mathews [the chair]' (p. 129) and, as a consequence, put substantial blame for the current state of accounting education in the lap of the Commonwealth Government. However, Macve appreciated the findings in that he noted that if an inquiry of a similar nature was to be held in the UK, similar findings would be likely to emerge.

The Australian Government's "response" to the Report was, in essence, to ignore it. The Higher Education Council, which advised the Australian Government at the time, rejected the major recommendations (Tippett, 1992). To the date of publication, undergraduate business degrees with specialist studies or majors in accounting remain as degrees spanning three years, except in the case of co-operative accounting degrees, which extend to a period of four years, including an internship of one year.

Other Australian inquiries

While flagging a pivotal point in which accounting education within Australian higher education was addressed in a government inquiry, the Mathews Report failed to make any significant impact in terms of government policy or scholarly research. The Report continues to be cited in Australian accounting education research and subsequent inquiries tend to focus on specific issues in accounting education, such as assessment and feedback (see, for example, Watty, Freeman, Howieson, Hancock, O'Connell, de Lange & Abraham, 2013) or changing skills sets (see, for instance, Hancock et al., 2009). While now an important record for historical accounting research, it sits as a reminder of the enormous challenges in achieving significant change in accounting education, such as a standard four year degree as also proposed by the predecessor task force.

Cappelletto (2010) produced a report commissioned by CPA Australia, the Institute of Chartered Accountants in Australia (now Chartered Accountants Australia and New Zealand), the National Institute of Accountants (now the Institute of Public Accountants) and AFAANZ entitled *Challenges Facing Accounting Education in Australia*. Unlike the present investigation, which examines the views of a wide range of stakeholders in accounting education, the 2010 report was based on two survey questionnaires: one to Heads of Accounting Departments or Schools and the other to accounting academics. The findings reported, therefore, reflected an inward orientation to the state of accounting education from the perspective of the academic accounting community. The four main themes addressed were: the vulnerability of funding models particularly related to international student income; falling numbers of domestic students and the impact of international student enrolments; unmet demand for accounting graduates and issues such as poor communication skills; and the profile of accounting academics (Cappelletto, 2010, p. 6).

Table 2.1: Issues addressed by Cappelletto (2010)

Issues from Heads of Accounting Schools (p. 31)
➢ Staff shortages caused by the difficulty of attracting and retaining appropriate staff
➢ The increasing number of international accounting academics
➢ The number of international students
➢ Concerns that international postgraduates in accounting were not employable in Australia
➢ The difficulty of maintaining quality with a large cohort of international students
➢ The significant shortage of funding, which had led to unrealistic compensation for accounting academics
➢ Changes in research and teaching funding with the expectation that the future would be even more severe with the demand driven model and an insufficient number of dedicated accounting academics
➢ The need to develop staff skills in technology and online learning
➢ National standards
➢ Variations in international student numbers and changes to funding
➢ Ageing of accounting academics
➢ Maintaining standards against a growth agenda
Issues from accounting academics (p. 8)
➢ More international students and their poor English causing increasing demands on academics
➢ Institutional expectations regarding quality teaching, research, publishing and PhDs
➢ Increasing number of students and class sizes
➢ Increased workloads and difficulty balancing teaching and research
➢ Reduced educational standards
➢ Commercialisation of education, pressure to generate income, the treatment of accounting disciplines as “cash cows”
➢ Advances in technology causing extra workload and a different focus with an emphasis on online and less face-to-face
➢ Reduced quality of students
➢ Administrative demands, reporting bureaucracy and accountability
➢ Course or unit content issues
➢ Difficulty in attracting suitable full-time staff and growing PhDs

Cappelletto (2010) reported on what Guthrie et al. (2014, p. 27) later described as ‘the sorry state of accounting departments in Australia’ (see also, Evans et al., 2010) and showed that many of the challenges in accounting education at the time were strikingly similar to those identified by

Mathews et al. (1990). Indeed, many of the issues or concerns raised in the Mathews Report continue to exist or may have worsened. Many of the issues identified by the Heads of Accounting Schools and by accounting academics, as surveyed by Cappelletto (2010), are outlined in Table 2.1.

Despite the tendency, as previously mentioned, for such inquires to be inward looking, the recurrence of similar issues over a period of nearly four decades, set against constantly changing government policies and institutional contexts, tends to underscore the challenges of shaping the future of accounting education. However, Australia is not the only country with a track record of conducting inquiries into the state of accounting education. Attention will now be turned to similar inquiries beyond Australia with a focus on those conducted in the USA and Europe.

United States

As noted in Chapter 1, the education of professional accountants has occupied the thoughts of authors of scholarly articles for in excess of 100 years. Some of the earliest inquiries into accounting education worldwide occurred in the USA, such as the Committee on Professional Education in Accounting published in 1959. Prominent inquires in the USA were conducted in 1986, during the period 1989 to 1996, in 2001 and, most recently, in 2012. Each of these inquiries is briefly considered in turn.

Committee on Professional Education in Accounting (1959)

The Committee on Professional Education in Accounting (Heaton et al., 1959) reported the results of a two-year investigation of the educational preparation required for a career in accounting, especially at collegiate or university level. The Committee focused upon 'the nature, objectives, and implementation of professional education in accounting' believing that 'its primary problem was to establish a concept of professional education for a career in accounting' (Heaton et al., 1959, p. 195). The study calls for a broad cultural background as part of the accountant's preparation for a career in the profession, which would not be dissimilar to any other professional, with three types of education required: liberal, cultural, non-business; basic accounting, business and related fields; and advanced study in accounting, business and related fields. Underpinning this position were the objectives of the education for professional accountants as espoused by the American Accounting Association (AAA), which were recognised as '(a) Educating the Citizen, (b) Education in Business, and (c) Education in Accounting' (Heaton et al., 1959, p. 196). The Committee considered that a degree of professional education in accounting should provide students 'with the theoretical background necessary to [the] proper interpretation of practical problems' (Heaton et al., 1959, p. 197). The Committee also espoused the major objective of technical accounting tuition in a professional degree as being 'to provide the graduate with the foundation to recognize, interpret and analyze the complex and specialized problems to be faced' in accounting careers (Heaton et al., 1959, pp. 197–198). Further inquiries into accounting education undertaken by different bodies followed with the Bedford Committee Report (1986) being recognised as one of the most prominent to have been undertaken in the USA.

Bedford Committee Report (1986)

Between 1967 and 1987, there were 17 models proposed for accounting education in the USA by seven organisations in total (Needles & Powers, 1990). The comparative analysis of these models undertaken by Needles and Powers (1990, pp. 262–263) shows:

- changes in the recommended objectives and structure of accounting degrees to have been relatively minimal;
- earlier models were specified in terms of hours in specific subjects while later models moved towards more broadly defined categories of knowledge;
- all models supported the need for a general education for accountants;
- the common body of knowledge for the accounting major or component had shown little change in categorical emphasis;
- differences in the general education and business components of the models presented were more a matter of form than of substance; and
- most of the models focused on accounting topics rather than on the learning process or educational strategies to be utilised.

The most significant of these 17 models, according to Sundem (1999), was the AAA report of the Committee on the Future Structure, Content and Scope of Accounting Education (known as the Bedford Committee Report) published in 1986. The Bedford Committee Report 'recommends that colleges and universities (1) approach accounting education as an information development and distribution function for economic decision making and (2) emphasize students' learning to learn as the primary classroom objective' (Bedford et al., 1986, Executive Summary). The Report specifically notes the 'emergence of an accounting profession which will provide information for economic and social decisions, using sophisticated measurement and communication technologies applied to a substantially enlarged scope of phenomena' (Bedford et al., 1986, p. 1) and the increasing levels of skills needed in terms of technical, conceptual and human relations. The latter set of skills is now commonly referred to as professional skills (Stivers & Onifade, 2013; IAESB, 2014).

The Bedford Committee 'emphasises the need for a strong, broad general education, but does not identify specific course or units or topics because the committee felt that it would defeat the purpose of general education' (Needles & Powers, 1990, p. 257). The Report advocates the adoption of active learning models and a move away from the predominant lecturing/problem-solving method of teaching. It concluded that current degrees of accounting education were inadequate to meet the needs of the changing profession and proposed a phased reform of accounting education to be completed by 2000. Central to this reform was the move away from the preparation of financial statements/reporting to an 'expanded economic/financial information development and distribution function' (Bedford et al., 1986, p. 25). Shortly after the conclusion of the Bedford Inquiry, the Accounting Education Change Commission (AECC) was formed by the AAA in August 1989.

Accounting Education Change Commission (1989–1996)

The AECC was created for an initial period of five years, which was extended to seven years. According to Sundem (1999), the AECC 'was needed … because the principles of continuous improvement were not being followed by many in the accounting academy'[3]. By February 1990, the AECC had established 19 task forces, which was later reduced to 16 by combining task forces with overlapping objectives (Sundem, 1999). By 1992–93, these 16 task forces had amalgamated into nine across three key areas – curriculum dissemination, faculty development and assessment (Sundem, 1999). The core aim of the AECC was to facilitate broad reform of accounting education for a profession that was rapidly changing. The AECC consultations and dissemination were

[3] http://www2.aaahq.org/AECC/history/preface.htm

extensive, issuing a number of position statements throughout its life (Sundem, 1999). However, its impact on accounting professionals seems to have been limited and for the key stakeholder group – educators – significant change resistance to change was met owing to a lack of agreement with the proposed changes, fear of failure, the effort needed to effect change and conflict avoidance. While initially well received, criticism of the AECC mounted after 1990 (see, for example, Poe & Bushong (1991) who were highly critical; Davis & Sherman (1996); and Previts (1991) whose criticism was milder). The critique by Barefield (1991), described by Mathews (1994, p. 199) as 'the most systematic and detailed critique of the AECC', identified a number of deficiencies in the Commission's program, was based on the belief that the desired changes would not be possible to attain. This included:

- the AECC's failure to include the full academic community into its reform degree;
- the antagonising of this marginalised section of the academic community by criticising its non-involvement;
- research "bashing";
- placing too much emphasis on the Perspectives "white paper"[4] rather than criticism from the profession;
- implementation errors in the grant degree and hastening to find solutions at the expense of rigour;
- having a "romanticised" view of liberal education and its promotion as part of accounting education; and
- a lack of transparency by censoring the pass rates for the CPA exam (Barefield, 1991, p. 307).

In commenting on the work of the AECC, Mathews (1994, p. 194) stated that 'discussion of the deficiencies in accounting education in the USA has proceeded for many years'. The collective efforts of academia and the profession across a number of decades do not seem to have produced a significant record of accomplishment or continuous improvement.

Despite the AECC's efforts, within five years of its winding up, a new study of accounting education emerged which would spark more controversy.

Albrecht and Sack (2000)

In their report entitled *Accounting Education: Charting the Course through a Perilous Future*, Albrecht and Sack (2000) considered the future of accounting education, concluding that there were structural problems associated with accounting education, including the division of undergraduate and graduate degrees, as well as accounting from other business disciplines. Chapter 1 of the Report, entitled 'Why accounting education may not survive in the future', flagged troubling times ahead for the profession. The study addressed the rapid decline in students choosing to major in accounting, the attitudes of accounting professors and accountants to their career choices (that is, whether they would complete an accounting major again, many would not do so) and the widely-held belief among accounting leaders and practising accountants 'that accounting education, as currently structured, is outdated, broken, and in need of significant modification' (Albrecht & Sack, 2001, p. 17). The authors noted the reluctance or recalcitrance of accounting academics (and their institutions) to change in response to changing business needs and

[4]This is a reference to Arthur Andersen and Co., Arthur Young, Coopers & Lybrand, Deloitte Haskins & Sells, Ernst & Whinney, Peat Marwick Main & Co., Price Waterhouse and Touche Ross (1989) *Perspectives on Education: Capabilities for Success in the Accounting Profession.*

environments. This reluctance contributed to a significant lag between the business and academic worlds. Systemic factors were affecting enrolment numbers: salaries for accountants were generally less competitive than other business disciplines; accounting had become a less attractive career choice, fuelled by the perception that accounting was boring and risked losing potential students to other business disciplines that were perceived to be more exciting and offered higher benefits. The closing message of Albrecht and Sack (2001) was unambiguous – a failure to change accounting education could result in a failure of the accounting profession – with a small and dwindling supply of new entrants into the profession and few educators. In short, they asked: 'Is the end in sight?' (Albrecht & Sack, 2001, p. 23). Notwithstanding the stark message delivered in the Report, there is little evidence that major change in accounting education emanated directly from it.

Pathways Commission (2012)

The Pathways Commission was a joint effort of the AAA and the AICPA, and revisits the issues considered by earlier major inquiries in the USA covering the structure of higher education for accounting in the face of a changing profession – but expanded to include issues of educational pathways and the development of strong communities of students, academics and practitioners (Pathways Commission, 2012). It is especially cognisant of the impact of technology in ways that were not reflected by earlier inquiries and especially on curriculum development and learning environments. For the Pathways Commission, that accounting education required a 'well-articulated vision of the role of accounting in the wider society' (Pathways Commission, 2012, p. 10). The main recommendations that emerged from the work of the Pathways Commission were to:

- build a learned profession for the future by purposeful integration of accounting research, education, and practice for students, accounting practitioners, and educators;
- develop mechanisms to meet future demand for faculty by unlocking doctoral education via flexible pedagogies in existing degrees and by exploring alternative pathways to terminal degrees that align with institutional missions and accounting education and research goals;
- reform accounting education so that teaching is respected and rewarded as a critical component in achieving each institution's mission;
- develop curriculum models, engaging learning resources, and mechanisms for easily sharing them as well as enhancing faculty development opportunities in support of sustaining a robust curriculum;
- improve the ability to attract high-potential, diverse entrants into the profession;
- create mechanisms for collecting, analysing and disseminating information about the current and future markets for accounting professionals and accounting faculty; and
- convert thought to action by establishing an implementation process to address these and future recommendations by creating structures and mechanisms to transition accounting change efforts from episodic events to a more continuous, sustainable process (Behn, Ezzell, Murphy, Stith, Rayburn & Strawser, 2012, pp. 597–599; Pathways Commission, 2012).

One of the key strengths of the Pathways Commission report was its identification of the barriers that prevented significant reform as recommended by previous inquiries. Among the most significant impediments are the following:

- a failure to acknowledge what drives faculty to change;

- an inability to overcome the silo effect in many departments where curricula are viewed simply as collections of independent courses or units;
- delays in incorporating effective practices in pedagogy because faculty lack experience, knowledge and development opportunities;
- the slow pace at which curricular change occurs within colleges and universities;
- a lack of flexibility in tenure processes and post-tenure review focused primarily on research productivity;
- a lack of reward structures promoting student-centeredness and curricular innovation;
- inability or unwillingness of deans and department chairs to implement change; and
- a lack of appreciation or understanding of the importance of sound pedagogy and professional relevance (Behn et al., 2012, p. 599; see also, Pathways Commission, 2012).

These impediments essentially remain in place. Another that may be added to this list, at least in the Australian accounting education experience, concerns the failure to identify, understand and communicate the interplay of accounting and human behaviour directly related to the collection, analysis, reporting and use of accounting information, and how the associated key performance indicators and their application, contribute to producing intended, and even unintended, change in organisations and broader social contexts.

Europe

By contrast to inquiries in Australia and the USA, European inquiries in accounting education have been narrower in terms of scope and scale. The Institute of Chartered Accountants in Scotland is the most active with a series of funded reports.

As authors of one of these reports, Paisey and Paisey (2001) considered the current education system in universities as an antecedent to professional education in accountancy, medicine, law and architecture. Their report focused heavily on aspects of professional education rather than merely on university-based offerings. Their critique indicated that the university curriculum was too narrow and the broadening of the curriculum through a balance of liberal and vocational approaches was warranted. Teaching methods employed were criticised for concentrating on lectures, seminars, tutorials and textbooks. Some innovations were highlighted, including the use of case studies, computer-assisted learning, simulations, videos, web-based resources and the integration of research (Paisey & Paisey, 2001, pp. 39–40).

The place of research in education was used to address what Paisey and Paisey described as ‘different ideas in the nature and purpose of higher education in accounting’ (2001, p. 40). The authors referred to claims of the existence of ‘a gulf between research and practice’ (Paisey & Paisey, 2001, p. 40). For a more liberal approach to accounting education (as supported by academics), the incorporation of research into the curricula is fundamental. This can be contrasted with the need/preference for a more vocational orientation desired by practitioners. The introduction of teaching quality assessments, however, has contributed to teaching not being regarded ‘as a subordinate activity’ (Paisey & Paisey, 2001, p. 132). Accreditation is an important external influence and may effectively narrow the curriculum in the face of calls for more liberal elements in education. In essence, accreditation focuses more on technical aspects of the profession and thus limits the range of study options for students. Accreditation and its emphasis on technical aspects was also listed as a potential inhibitor to teaching innovation, such as the use of case studies or practicums. Paisey and Paisey (2001, p. 121) found it encouraging that courses such as ‘social accounting, environmental accounting and critical accounting’ are being taught in universities, providing ‘a means of fostering understanding of accounting’s wider contexts’. Such

concern for the study of accounting in the contexts in which it operates is regarded as a call for a focus on accounting as social practice.

Other reports flowing from funded research by British accounting bodies tend to be narrowly focused such as Ferguson, Collison, Power and Stevenson (2008) on the role of textbooks in the construction of accounting knowledge, Duff and Marriott's (2012) report on whether teaching and research are partners or competitors, and the exploration by Beattie and Smith (2012) of PhD students as future accounting academics.

Ad hoc reports emerge from many countries in Europe in relation to accounting education in both historical and contemporary environments (see, for example, González, Montaño & Hassall, 2009; Vysotskaya & Prokofieva, 2012), but there is a lack of systematic and broad ranging inquiries into accounting education such as those conducted in the USA and, to a lesser extent, in Australia. These projects are more likely to be reported in the scholarly literature than as reports suitable for digestion by both academics and practitioners alike.

Summary

It is clear from previous inquiries, and from the relevant literature, that a number of recurring issues have emerged in relation to accounting education, including the structure, content and length of accounting degrees, institution-level issues around staffing levels, class sizes and research support, the quality of graduates, attracting and retaining suitably qualified academic staff, and the skills-mix necessary to achieve successful careers in the accounting profession. Issues in accounting education, therefore, are global rather than local with many of these fitting the mould of perennial issues. Many of the issues raised in previous inquiries remain as important, if not of more importance, at the time of conducting this investigation. The following three chapters deal respectively with research approach and methods, institutional context and the future of accounting and the challenges ahead. Thereafter, the themes that are the subject of this investigation are expanded upon in chapters six to nine. The list below outlines the main themes that are addressed in this study.

- Theme 1: The professional knowledge and professional skills required for accounting graduates (Chapter 6).
- Theme 2: The inculcation of professional values, ethics and attitudes and the preparation of graduates for professional life (Chapter 7).
- Theme 3: The role and relevance of scholarly accounting research and the nexus between research, practice and teaching in accounting in business education (Chapter 8).
- Theme 4: Technology and innovation in accounting education (Chapter 9).

Chapter 3: Research approach and method

Introduction

The purpose of this chapter is to outline the approach used in the study, including the development of the interview schedule, recruitment and participants and details of the method of analysis.

Theme identification and roles

A group of experienced accounting scholars (all with ties to the profession) were assembled, including Dr Amanda Carter, who also acted as project manager and research assistant under the auspices of RMIT University. The investigative team members were responsible for:

- identifying potential interviewees;
- developing interview questions;
- conducting interviews[1];
- data analysis and identification of key findings; and
- drafting and review of chapters, including recommendations and action points.

An initial planning workshop for the investigative team was held in Melbourne in mid-January 2014 to scope out the key issues and themes: a process of brain-storming their collective understanding of the sector and the accounting education literature.

Study objectives and procedure

The investigation employed interviews with influential stakeholders. The aim was to gain the views of multiple stakeholders in the sector and to address the main research aims:

- assess the current state of play of accounting in business education in Australia;
- focus on the key challenges, issues and opportunities faced by the accounting education sector; and
- develop feasible, innovative and productive ways forward to meet the many challenges faced by accounting education and to take full advantage of the opportunities identified.

In line with these aims, the investigative team was concerned with the current state of accounting education, the challenges, issues and opportunities being faced, and the initiatives to shape the future of accounting education. A literature review of prior inquiries and related research into accounting education globally was conducted as summarised in Chapter 2.

Development of the research instrument

This study used semi-structured interviews as they provided the most flexible method of exploring the themes identified with the participants resulting in some variation in the phrasing of questions and the use of additional questions to extend or clarify responses to the interview questions (Galletta, 2013). This variation in phrasing and the questions posed was also affected by the use of multiple interviewers, which may present additional challenges to the conduct of the research (Matteson & Lincoln, 2009) but the benefit of multi-interviewer semi-structured interviews, however, is the ability to incorporate additional complexity and richness to the collection and

[1]Except Dr Carter

analysis (Matteson & Lincoln, 2009). To coordinate the interview process and ensure consistency between interviews, whilst capitalising on the richness of the data, team meetings were held during which the interview questions were developed and refined.

Informed by the literature review and personal experience, a set of 15 interview questions was finalised in June 2014. Of these questions, three (Questions 13 to 15) were posed in circumstances where the experience of the interviewee indicated that they could contribute with an informed response and where time permitted. Supplementary questions relating to four of these 15 questions were prepared as a contingency to probe further the responses from the interviewees to the issues addressed. Therefore, such supplementary questions were not always posed. The schedule of questions, including the supplementary questions, is found in Appendix B.

Focusing on shaping the future, the interview questions began with three that were designed to promote an understanding of accounting work as performed at the time of the interviews and as expected to be undertaken in ten years ahead (i.e. in 2024). In addition, interviewees were asked what professional knowledge and professional skills accountants would need to work in the profession in 2024. Questions four and five explored what interviewees viewed as the changes necessary to accounting education in order to meet the professional knowledge and professional skills envisaged for 2024 and the "problems" in accounting education that existed at the time of the interviews. An opportunity was also provided for interviewees to suggest strategies that might be useful in addressing the problems identified.

Following these general questions, more specific details of accounting in business education were explored. This included the range of key stakeholders involved and their needs. One of the key challenges for accounting education identified in the literature is the appropriate balance between the teaching of professional knowledge and the development of professional skills. Question seven addressed this key issue. Again, interviewees were provided with an opportunity to identify strategies that may assist higher education providers in delivering content aimed at the further development of professional skills.

Questions eight and nine focused on professional values, ethics and attitudes (as related to the work readiness of graduates) as the literature indicated that not all graduates are well equipped in this regard. Question ten turned attention to technology. Given the development of a range of technologies that were not in existence at the time of the publication of the Mathews Report and the importance of technology to accounting education and practice more generally, the question explored the impact of changing and expanding technologies on accounting in business education and in business more generally.

Questions 11 and 12 considered scholarly accounting research and its benefit to the profession. Specifically, interviewees were asked to present a view on the relative importance of research and learning and teaching in the higher education sector.

The final three questions considered disparate and broad issues, comprising proposed changes to Federal Government policy and the potential impacts on accounting in business education, what universities may further do to support professional practice, and recruitment preferences in terms of university versus other tertiary education degree providers. Question 12 on proposed Federal Government reforms of the higher education sector was sometimes not answered in view of a lack of knowledge of such reforms by the interviewees or due to interview time restraints.

Study participants

A provisional list of interviewees, related to a broad-based stakeholder group and focusing on employers of accounting graduates, was developed from the suggestions of the members of the investigative team. Four main classifications of interviewees were developed. Two categories represented employers – Accounting Firm Employers and Other Employers – that distinguished between professional services firms by size (i.e. large, medium and small) and employers in other contexts in the corporate sector. Regulators were drawn from organisations that play a role in the regulation of accounting or accounting practice, such as professional accounting bodies and accounting standard setters or corporate regulators. Academics (the smallest group represented in the study) were included to provide first-hand accounts of institutional issues, with all of them having connections within the wider accounting profession. From a broad list, the investigative team nominated specific individuals who could be approached for interview. Interviewees were individuals whose current roles and earlier professional experience exposed them to an array of issues related to graduate employment and/or the ongoing professional development of accountants and were willing to participate and share their knowledge and communicate their experiences. Therefore, these individuals were regarded as experts in their respective fields. Interviewees did not represent their organisations but were individuals with expertise gathered from a wealth of experience in graduate recruitment and staff development in accounting. These experts provided experience-based data and 'may provide a unique source for "inside" information' (Dorussen, Lenz & Blavoukos, 2005, p. 317).

Thirty-four interviews were conducted during this investigation. Table 3.1 shows the demographics of the study participants. Dissecting these groups further, Accounting Firm Employers consisted of principals and partners or recruitment managers for professional service firms. Other Employers consisted of chief executive officers, chief financial officers and divisional/department heads from publicly listed companies. Academics consisted of heads of school, discipline coordinators and other professors from accounting schools/disciplines from universities in Victoria, South Australia and Western Australia, with one interviewee residing in the Northern Hemisphere. Regulators included professional accounting bodies, with interviewees comprising chief executive officers, education directors, chief accountants, and senior managers. It should be noted that experts drawn from the Big Four international professional services firms, the four major Australian commercial banks and the two largest professional accounting bodies were included amongst the interviewees. It is, therefore, apparent that this sample comprised relevant experts from major stakeholder groups in Australian accounting education. Table 3.1 also depicts a relatively even spread across the four classifications with Academics being the smallest. Men (73%) are much more prevalent in the sample of experts than women (27%).

Table 3.1: Study participants

Classification	Men	Women	Total
Accounting Firm Employer	8	3	11
Other Employer	5	3	8
Regulator	8	1	9
Academic	4	2	6
Total	**25**	**9**	**34**

Individuals were invited to participate with an *Invitation to Participate* letter via email, which included a summary of the project and outlined procedures for ensuring security and confidentiality of their responses. The interview schedule was tested through a small number of pilot interviews. While no issues of any consequence were identified during the pilot interview phase, such a pilot cannot guarantee success in the formal interviews (van Teijlingen & Hundley, 2002). For this reason, the recordings from the first five interviews were assessed for any problems before proceeding with the remainder of the scheduled interviews. As expected with a multiple interviewer strategy, some variation in wording was detected but was not assessed as posing a significant variation in, and the substance of, the questions.

The first formal interviews commenced in July 2014 and the last interview was concluded in November 2014, with virtually all of the interviews completed by late September. Interviews were of between 30 and 75 minutes duration. Given the number of interviews conducted and the various locations where held, six members of the investigative team participated in the interviewing process. The majority of interviews were conducted face-to-face with the remaining interviews conducted by telephone for ease of access. The difference in the format of the interviews was not expected to create significant variations of responses. Prior literature indicates that the mixing of interview modes might present an issue [see, Harvey, 1988, especially given the expected length of the proposed interviews (45 minutes)] but the investigative team concluded that there was no apparent decrease in the usefulness or completeness of the telephone versus face-to-face interviews (see, Sobin, Weissman, Goldstein, Adams, Wickramaratne, Warner & Lish, 1993; Aquilino, 1992; Sturges & Hanrahan, 2004).

Interview transcripts were produced using commercial providers to facilitate analysis. A de-naturalised transcription was used – one which does not capture accents or involuntary vocalisations (Oliver, Serovich & Mason, 2005) but retained colloquial phrases – representing a faithful account of the interaction between the interviewees and interviewers. As the quality of the transcription affects the quality of the data analysis (McLellan, MacQueen & Neidig, 2003), all transcripts were quality checked for accuracy against the recordings. Following the interviews, an additional level of authorisation was sought from the interviewees through a review of the transcripts, which provided an additional level of quality assurance and allowed a reflexive enrichment of the data and an empowerment of the participants (Mero-Jaffe, 2011). Interviewees also agreed to be quoted based on their approved transcripts. Where no authorisation for quoting was provided, the data remained in aggregate for analytical purposes only. Two forms of authorisation were catered for: unconditional, which allowed the quoting of passages without further permission; and conditional for which specific consent to use quotes was required, sought and obtained[2].

All interviewees' identities were protected through the anonymisation of the transcripts (Saunders, Ditez & Thornhill, 2014). All names related to an individual were removed before analysis and words were removed that may have represented a threat to anonymity and confidentiality.

Data analysis

Transcripts were subjected to thematic analysis (Boyatzis, 1998). Thematic analysis is widely used across multiple disciplines for the analysis of interviews and other text based data (Braun &

[2]Of the 34 interviewees, nine requested conditional permission. On review, all but one agreed to be quoted.

Clarke, 2006) and offers a flexible and iterative approach to analysis. While a priori themes had been established during the planning phase of the study, these themes were refined during analysis and sub-themes emerged across questions. Thematic analysis is an organic analytical method and is often misunderstood or undervalued by researchers (Braun & Clarke, 2006). Additional efforts were made during the analysis to counter any possible limitations that the method might present, including multiple levels of analysis, discussion amongst the investigative team and comparisons of results.

Two members of the investigative team had responsibility for reading all interview transcripts in their entirety to ensure, amongst other things, the veracity of the findings identified and to provide an overview of emerging interdependencies amongst themes and sub-themes. This analysis was conducted independently of one another and the results were compared during the study. These two authors were also responsible for assuring a balanced representation of the interviewees as a collective, which was important because of multiple interviewers and the spontaneous emergence of data related to themes at unexpected times during the interviews. All members of the investigative team were responsible for the development of a cohesive reporting of the analysis based on extracts from the transcripts.

Summary

This chapter has outlined the procedures used to collect and analyse the data for the study, the findings of which will be presented in Chapters 5 to 9, following chapter 4which considers the institutional context. Chapter 5 analyses the work of accountants at the time of the interview and into the future, as well as the challenges currently faced by educators. Chapter 6 addresses the professional knowledge and professional skills identified as underpinning accounting in the future. Chapter 7 reviews professional values, ethics and attitudes and the associated work readiness of graduates. Chapter 8 explores scholarly research and Chapter 9 addresses the use and influence of technology in accounting education.

Chapter 4: Institutional context

Introduction

As in all sectors and professions, ongoing evolution and change may create inherent structural challenges, which provide a rich tapestry to stimulate inquiry (see, for example, Cappelletto, 2010; Evans et al., 2010; de Lange & Watty, 2011). These inquiries, outlined in Chapter 2, have, over time, highlighted the growth of accounting in the higher education sector and the challenges that create an appetite for change (Bedford et al., 1986; Albrecht & Sack, 2000; Cappelletto, 2010). It may be argued that these reports have presented adequately the challenges faced by the sector. Accounting academics and accounting education policy makers, including accreditation agencies have, by and large, failed to drive meaningful restructuring in the sector resulting in ongoing calls for change (see, for example, Pyne, 2014).

This chapter, the first of six focusing on interview findings for themes that emerged during initial project planning, focuses on the challenges which the next decade is likely to present. This chapter outlines the institutional context in which accounting education takes place. To ground the findings in context, participants were asked what they thought accountants did in 2014 (i.e. at the time of the interviews) and what they thought they would be doing in ten years' time in 2024 (outlined in Chapter 5). Following on from this, participants were asked to identify the key competencies that would enable accountants in 2024 to successfully carry out the range of work they expected to be undertaken. Having established the range of work accountants would be undertaking in 2024 and an understanding of the competencies required, attention then turned to how the profession – practitioners and academics alike – could prepare aspiring accountants for 2024 and beyond. In particular, participants were asked about the main problems with accounting in business education as it stood at the time of the study and what changes and innovations they would like to see brought in. The professional knowledge and professional skills needed are explored in Chapter 6.

Professional values, ethics and attitudes and scholarly research are two themes at the core of academic endeavour and are dealt with in Chapters 7 and 8 respectively. While participants were asked directly about the impact of technology (outlined in Chapter 9), the importance of technology in shaping the present and future of the profession was evident from the beginning of this investigation. It is a pervasive influence, sometimes regarded as digital disruption (Deloitte, 2012), and is felt across many of the themes emerging from the interviews. When the investigative team first started developing the study it was recognised that technology would be an important element of this investigation. Chapter 10, the final chapter, outlines an array of recommendations based on the study's findings and the literature review.

Institutional context of accounting in business education

Accounting academics face the difficult task of delivering the requisite professional knowledge while also trying to develop the professional skills of future professionals. With professional accreditation of accounting degrees, the accounting curriculum tends to be somewhat similar across institutions. Notwithstanding such pressures towards conformity, there has been no attempt at developing a standardised national curriculum although there are now national threshold learning standards for the discipline. Further, conformity and uniformity has also been driven by many business schools seeking international accreditation by the Association to Advance Collegiate Schools of Business (AACSB) and the EFMD Quality Improvement System (EQUIS).

Such standardisation of the curriculum may result in unthinking uniformity and an increasingly commoditised education. However, accounting knowledge is already internationally commoditised in various ways, such as through the adoption of International Financial Reporting Standards (IFRS), IES and the IFAC's Code of Ethics for Professional Accountants, and other globally accepted practices or norms. The challenge of delivering high quality and relevant curricula and differentiating accounting degrees and courses or units within different institutions remains immense.

Higher education plays a significant role in the Australian economy, not only in providing appropriately qualified labour, but as a contributor to gross domestic product and exports (Enright & Petty, 2013). In the fiscal year 2010–2011, higher education exports were valued at AUD9.5 billion (Enright & Petty, 2013, p. 69). In 2014, education services contributed AUD17 billion to the economy (with approximately AUD8.5 billion in tuition fees) and exports of education services accounted for five per cent of total exports (Productivity Commission, 2015, p. 3).

Globally, Australia has a six per cent share of the total international student market (OECD, 2014). The number of international students represents a significant portion of the total number of students enrolled in Australian universities within management and commerce which (51.8%) and it is important to note that this field of education represents the single biggest number of international students, which greatly exceeds the second highest enrolment in engineering and related technologies (8.2%) (Enright & Petty, 2013, p. 69). Recent figures (Tadros & King 2014, see also, Figure 4.1), show the relatively strong growth in student numbers for accounting since 2001 to 2012 and that the increase in overseas-sourced student numbers significantly outstrips the demand from domestic students (see also, Cappelletto, 2010).

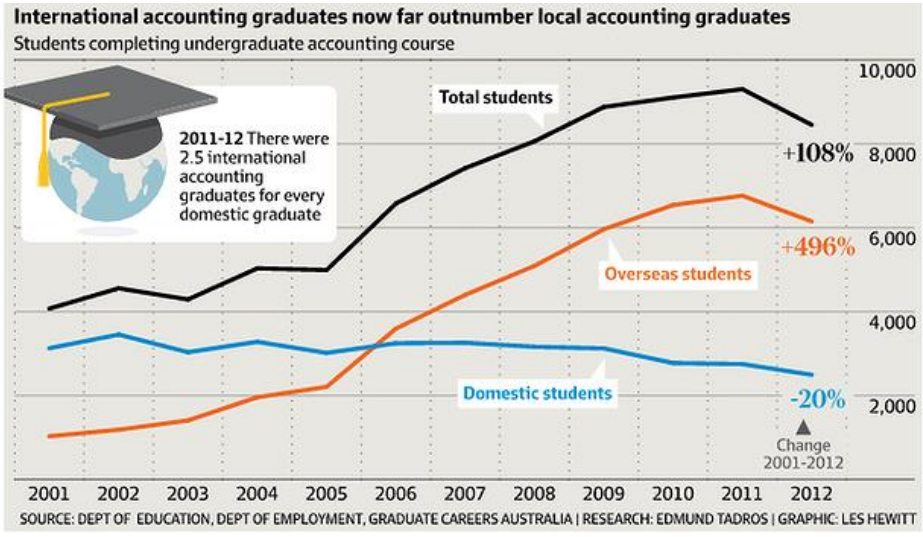

Figure 4.1: International accounting graduates
Source: Tadros and King (2014)

The remainder of this chapter explores several elements of the institutional context as background to this study: commoditised knowledge and standardised accounting curricula; accreditation; online learning and accounting education; accounting academic demographics; the regulatory framework; performance indicators and incentive structures; and, cross-subsidisation of other

disciplines. There follows a discussion of the future of work based on present understandings of recent and expected changes to work.

Commoditised knowledge and standardised accounting curricula

Commoditisation is intended to make all products and services readily available on the general market but also provide a valuation for those products and services (Lewis, 2010).

The level of educational commoditisation in the 21st century in the form of websites, books, articles and, for accounting, standardised software and international pronouncements has brought its share of criticism. Some argue that this commoditisation in higher education has led to:

> …the rise of surveillance and control mechanisms such as performance audits and measures of academic production and merit, in work intensification, in the entrepreneurialisation of academic work, and in academic practices that seem increasingly to close down research and scholarship aimed at critical social intervention (Lewis, 2010, p. 3).

Commoditised accounting knowledge is necessarily focused on those things easily de-contextualised – professional knowledge. This constrains accounting education to 'narrowly defined, but misconceived, disciplinary boundaries, focusing on the techniques and "skills" of accounting practice' (Boyce, 2004, p. 565). While commoditisation is attractive owing to efficiency and ease of delivery, it undermines attempts to make accounting education both relevant and grounded in the broader socio-historical context (Hopwood & Miller, 1994; Boyce, 2004).

Commoditisation of knowledge and accounting education can make the development and delivery of professional knowledge and professional skills more desirable from the (corporate) university's perspective. The danger, however, is that the decontextualisation associated with commoditisation can, from the perspective of business, render it irrelevant where a necessary part of understanding accounting relates to its roles, uses and impacts in organisational and social contexts (Boyce, 2004). Accordingly, this appreciation of the full dimensions of accounting establishes a window for institutional differentiation through how commoditised knowledge is re-contextualised.

Accreditation

Virtually all accounting degrees offered by Australian universities are accredited by CPA Australia and Chartered Accountants Australia and New Zealand Formal standardisation of accounting curricula is not generally mandated nationally or internationally[1]. However, membership with IFAC through national or global professional accounting bodies, and the accreditation of degrees and acknowledging the obligation to comply with the IES, can have the effect of standardising content. Some argue that accreditation can be responsible for narrowing curricula (Dillard & Tinker, 1996; van der Merwe, McChlery & Visser, 2013). While there are many advantages to this requirement, such forces may mean that graduates of today may not, in broad terms, be prepared sufficiently for the modern world of professional accounting practice. Increasingly, accountants in

[1] However, the 'Bologna Process' in the European Union constitutes a pressure to harmonise higher education in light of increasing student mobility (Mecthenberg & Strausz, 2008). In effect it aims to make curricula similar (but not identical) so that students may enrol in multiple universities and be credited for those studies. Institutions and members of the European Union, however, feel constrained (Ravinet, 2008; Fernandez-Sainz, Garcia-Merino & Urionbarranetxea, 2015) and unintended consequences, such as changed relationships and significant challenges including tension between traditional universities and the modern business imperative may result (Pusztai & Szabó, 2008; Witte, van der Wende & Huisman, 2008).

Australia are operating in wealth management or wealth advisory services and these sorts of growth areas are often not included in international standards. Therefore, emerging fields of professional knowledge may not be attracting sufficient consideration in accounting accreditation circles while other traditional areas may remain over-emphasised or largely unchanged in the curricula.

In Australia, the professional accounting bodies accredit educational qualifications to ensure graduates meet their entry standards. Mathews (2004) considered the effect of accreditation and specifically whether this led to an unacceptable degree of uniformity and focus on accounting theory subjects in Australian undergraduate degrees. He concluded that accreditation had little effect in terms of uniformity. Instead, Mathews highlighted the important link between universities and the profession through initial professional development for future professionals and, thus, the need for accreditation as an assurance practice. The attraction of such accreditation is obvious – an immediate global recognition of an institution's standards. In addition, accreditation processes provide an opportunity for institutions to become clear on their strategy and missions (Zammuto, 2008). Accreditation, however, is a double-edged sword – on the one hand it provides clarity of goals and reputational benefits but, on the other hand, there is the risk of high levels of uniformity, and resulting petential for inertia, rather than an emphasis on differentiation of degrees and educational innovation.

Online learning and accounting education

The move to online learning may need to be re-evaluated as it commoditises knowledge that is now more accessible owing to technological development. For accounting educators, technology presents both opportunities and threats (see, in particular, Chapter 9). The development of MOOCs has brought this nexus into focus. However, the online delivery of accounting education is not new and has a well-developed pedagogy (Litherland, Carmichael & Martínez-García, 2013). In light of commoditised knowledge, Chau (2010) recommends caution in relation to MOOCs. Commoditisation may present an undesirable outcome as much as an opportunity. The risk with online delivery is the possible failure in providing appropriate cultural contextualisation of knowledge (see also, Chen & Lo, 2013) and face-to-face, spontaneous deliberations often produce greater educational outcomes, particularly in terms of developing or refining professional skills.

Chau (2010) recommends caution in the use of online learning and encourages institutions to examine why they choose this mode of delivery apart from the economies of scale of such delivery platforms (Parker & Guthrie, 2010). The typical modern university has 'taken on meeting the needs of business as their core mission' (Boyce, 2004, p. 566) and, as a result, have become, or at least appear to have become, businesses themselves. In adopting this corporate mentality, all aspects of academic work are affected. This could indicate that the academic work itself, as much as the knowledge involved, has been or has attempted to be commoditised (Lawrence & Sharma, 2002).

Demographics of accounting academics

Like much of Australia, the academic accounting discipline is ageing. The general academic community is facing a significant reduction in numbers as baby boomers start to retire (Hugo, 2008). However, the retirement of baby boomers is an insufficient explanation for the reduced numbers of academics: higher education is now a globally competitive talent market and the expanding Asian university sector is creating a high number of entrants. The UK and Canada are both seeing similar ageing trends amongst their academics: the UK witnessed a significant

increase in the number of full-time staff aged over 55 from ten to 17 per cent and in Canada it was estimated that between 4,500 and 12,000 academic staff will have retired by 2010 (Hugo, 2008). Hugo's examination of Australian academic demographics reveals that the community is now top-heavy and that it is older, with a mean age in 2006 of 40 years. Lecturers and tutors were more likely to be older than other university employees – 54.2 per cent aged over 45 years and 24.7 per cent over 55. Hugo (2008, p. 17) notes:

> … [the]unprecedented effort by universities to offer redundancy packages to older staff in a push to increase student–staff ratios, reduce the number of higher level academic staff and reduce the overall costs of the academic teaching workforce.

Two years later, Wright and Chalmers (2010, p. 77) pointed to a shortage of accounting academics in Australia, with a 'slow but steady trickle of the best and brightest scholars [moving] to more highly remunerated and funded United States universities'.

Cappelletto (2010) provides basic demographics of accounting academics in Australia in 2009. For the institutions that responded to the survey, of continuing staff 53.12 per cent are aged 45 or over, with 23.74 per cent over 55 and 18.11 per cent aged under 35 years. Full-time equivalent staff numbers across universities varied from 15 to 90 with a large variation between. Staff–student ratios also varied from 1:21 to 1:72. Gender distribution was approximately 60:40 (men to women) and was remaining stable. Around 57 per cent of academic accounting staff was appointed at Level A or B (41%). The Mathews Report (1990) noted the lack of higher degrees amongst accounting academics; however, Cappelletto (2010) notes a significant increase in the number of PhD qualified staff and those enrolled in PhDs, with an over 900 per cent increase in PhD qualified staff over a three year period and 330 per cent increase in those enrolled.

Regulatory framework

Concerns about the quality of Australian university courses or units have plagued the university sector resulting in a strengthened regulatory regime. Examples of oversight within Australia are the formation of TEQSA and the mandatory application of the Australian Qualifications Framework (AQF). In brief, TEQSA is an independent statutory authority established in 2011. It falls within the Industry and Innovation portfolio of the Commonwealth Government. Its role is to regulate and assure the quality of Australia's higher education sector. It registers and assesses the performance of higher education providers against the Higher Education Standards Framework. The Framework comprises five domains: provider standards; qualification standards; teaching and learning standards; information standards; and research standards. The provider standards and qualifications standards are collectively the Threshold Standards, which all providers must meet in order to enter and remain within Australia's higher education system. TEQSA undertakes both compliance assessments and quality assessments. Compliance assessments involve assessing a particular provider's compliance against the Threshold Standards for registration as a higher education provider (TEQSA, 2014).

The other key arm of government regulation of Australian universities is the Higher Education Standards Panel. This is an Advisory Body established under the *Tertiary Education Quality and Standards Agency Act 2011* (Cth). The Panel was established to provide independent advice to the Commonwealth Minister(s) responsible for tertiary education and research on the Higher Education Standards Framework and to advise and make recommendations to TEQSA on matters relating to the Higher Education Standards Framework. The Panel's work is viewed as independent of TEQSA. This ensures the separation of standards setting and the monitoring and enforcement functions carried out by TEQSA in its regulatory role.

Performance indicators and incentive structures

Parker (2002, pp. 612–613, 616) argued that the traditional 'knowledge based values' of universities have largely been replaced by commercial values that seek to exploit knowledge for commercial purposes. Christensen (2004, p. 488) highlights that 'core values of universities now include financial viability, vocational relevance, industry relationships, market share, public profile, and customer/client responsiveness'. These values are transparently reflective of business enterprise values as private sector business concepts and these practices have been increasingly imported into the university sector. Indeed, he contended that not only have universities assumed business needs as a core value but that they have increasingly come to look like businesses themselves. In illustrating this point he posits the use of financial and economic incentives as the means to ensure that the state controls university activities and focus.

Parallels of this evolution with other public sector entities can be seen in the rise of university administrative systems increasingly dominated by managerialism. This dominance of managerialism in public sector entities is known as New Public Management (NPM) (see, for example, Olson, Guthrie & Humphrey, 1998; Lapsley, 1999). A critical component of the incentives and rewards structures deriving from NPM is having accounting academics with publications in high quality and reputable international journals on staff. In this way, accounting schools maximise their chances of retaining high research evaluations and the attendant research funding. This process is reinforced by external research ratings of departments. Moreover, such rankings influence the recruitment of prospective students, especially those from overseas, upon which universities are increasingly financially dependent. Cribb and Gewirtz (2013, p. 344) illustrated that in this world of NPM in the UK, the performance of academics is:

> …increasingly spoken of, not only by managers but by themselves, in terms which derive directly from the reputational drivers of the university – for example, that they have x grants from prestigious funders, that their publications are 4*,or that they have a high "h-index".

The impact of the performance metrics built around research performance is also supported by empirical research. For example, de Lange, O'Connell, Mathews and Sangster (2010) interviewed Heads of Accounting Schools in Australia about the impact of the research assessment exercise and their results showed that while most respondents had a positive attitude toward the initiative there were many concerns about its operationalisation, its capacity to produce undesirable outcomes such as gaming behaviour, and its potential to concentrate research efforts on a narrow group of North American journals thus marginalising non-mainstream research such as qualitative research in general as well as specialist fields such as accounting education and accounting history. Accounting schools were also perceived as being especially vulnerable to poor performance in this exercise given their large student–staff ratios and high proportions of developing researchers relative to other disciplines. Key performance indicators in areas such as student teaching evaluations, course or unit experience and completion rates have also come to permeate the higher education landscape in recent years. In sum, the rise of NPM in higher education providers would appear to be touching all aspects of academic life. It could be stated, of course, that improving performance of staff or organisations is a desirable outcome. The consequences, particularly any unintended consequences of such moves, should be identified and evaluated (see, for example, Carnegie & West, 2005).

Cross subsidisation of other disciplines

As previously noted, higher education has become a service that can be exported to increase national income within the context of a growing global higher education market (Larsen, Martin & Morris, 2002). Studies have shown that business courses and, in particular, accounting have proven to be highly attractive to international students resulting in large growth in enrolments. Typically, Australian universities operate an internal resource allocation model whereby all income from student fees is notionally allocated to schools but then is clawed back from those same schools in the form of a so-called contribution margin. The contribution margin is determined through a complex formula within most universities and there does not seem to be any consistent formula or approach across the sector. It follows that the levels of the contribution margin vary from school to school and university to university but it is generally accepted that typically the contribution margin is much higher for business schools than for many other discipline areas. This variance and these high margins often give rise to claims of cross-subsidisation both of other disciplines and also of research (see, for example, Parker & Guthrie, 2010). As noted by Parker and Guthrie (2010, p. 7):

> Within the university community, business schools have relatively poor standing. Success in revenue raising has meant that business schools are regarded in their institutional role as "cash cows". Business schools have been highly successful in commodifying higher education and contributing financially to their universities. They have not only attracted large revenues from fee-paying international and postgraduate coursework students, but minimized costs with the highest staff/student ratios at 1:34 (DEST, 2007). Financial success has sometimes been at the cost of academic respect within the university (Ryan and Guthrie, 2009). They are rarely held out as examples of the university's strength or contribution to society.

Notwithstanding these claims of cross-subsidisation, it should be recognised that academic accounting, both in Australia and in other countries, has been a major beneficiary of the growth in international student numbers. There has been a rapid expansion of accounting student loads in business education since at least the mid-1980s and for much of this time accounting studies have been encouraged due to a range of factors, including high student demand (especially from overseas students) with accounting degrees being relatively inexpensive and easy to provide (Hopper, 2013). Yet, because of this relative success in attracting students, accounting schools have also been criticised in some quarters. For example, Hopper (2013, p. 130) notes that 'paradoxically, at a time when businesses are exhorted to become more like universities, universities are increasingly resembling Fordist mass production education factories'.

The future of work

Work is changing and it is expected to continue to change. The future of work is one of the most significant issues presently being faced (see, for example, PwC, 2014; Dawson, 2015). One of the main drivers in rapidly changing society and workplaces is the abundant use of technology to do things differently – faster, more economically and reliably. Through automation and artificial intelligence, vast collections of data (often called "big data") are being gathered and used in ways previously not considered. As a result, accounting work is becoming increasingly segmented into compliance-style work where increasing automation is creating enormous economies of scale and facilitating the outsourcing to lower-cost economies of transactional processing in proportions never witnessed. At the other end of the spectrum, business advisory services with an emphasis on value creation and linked to the strategic direction of organisations, is becoming increasingly

necessary and the focus of professional services firms. An outcome of these trends is the 'potential for vast technological unemployment' (Roos, 2015).

The accounting profession is not immune to such trends. Indeed, accounting work is facing considerable disruption through technologically driven shifts in employment practices and processes. Professional services, including accounting and law, are experiencing reductions in employee numbers. There is the potential for unforeseen numbers of professional employees being assigned to the task of seeking alternative employment or new graduates being unable to enter these professions. Such a circumstance leads to consideration of career development paths, the level of skills required for available jobs and future employment strategies. Roos (2014) highlighted these trends in his presentation to the *11th International Conference on Intellectual Capital, Knowledge Management and Organisational Learning* (see, Figure 4.2). Medium-skilled jobs are evaporating, with incumbents being required to move towards low-skilled compliance orientated work or high-skilled jobs focusing on value creation and strategy. Individuals, while appearing to have a choice in the direction they take, are required to face decisions about their future employment and lifestyle options. While the shape of the curve in Figure 4.2 for accounting is essentially unknown, such choices seem to be more rampant in the accounting profession than has been experienced previously.

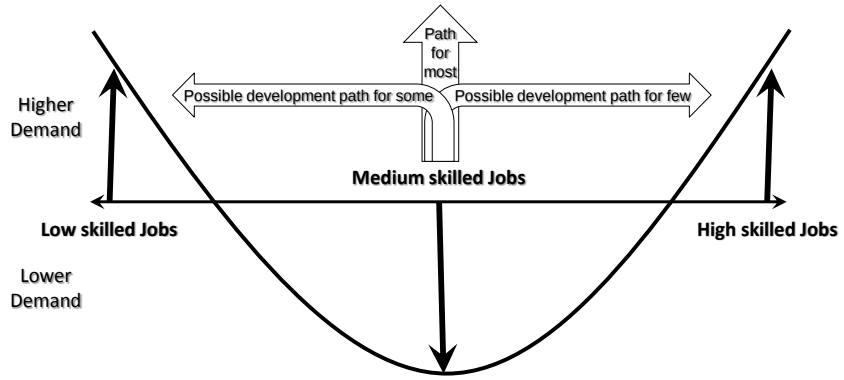

Figure 4.2: Changing demands for jobs across the skills spectrum

Source: Roos, 2014

For knowledge-based economies, there is awareness on the part of governments, that higher education will play an important role in the early education of professionals and produce graduates who are able to adapt to changeable, complex business environments and workplaces (Andrews & Higson, 2008; Freeman & Wells, 2015). Such issues have been addressed by recent editions of *INTHEBLACK* (Muldowney 2015a, b). However, individuals will need to take more personal responsibility for the development of their own skills whether employed or an entrepreneur (PwC, 2014, p. 22). Broadly, according to PwC (2014, p. 20), employers face a key challenge in 'ensuring that the people being hired genuinely have the expertise required or claimed'. For graduates, taking personal responsibility includes giving a faithful representation of their professional knowledge, professional skills and professional values, ethics and attitudes to potential employers.

Summary

This chapter has considered salient aspects of the institutional context of this investigation. It has focused on how the environment has impacted on accounting and elucidates the key challenges facing the accounting profession and education. While accounting is shaped by the environment, it also shapes the behaviour of individuals in the environment, as a symbiotic relationship, with implications for social and organisational functioning and development. The next chapter progresses to issues of accounting now and in the future and the challenges that are presented to accounting education in meeting this vision.

Chapter 5: The future of accounting and the challenges ahead

Introduction

This chapter considers the challenges for accounting in business education as identified by the interviewees. However, to ground the findings in context, participants were asked what they thought accountants did now and what they would be doing in ten years' time. Following on from this, participants were asked to identify the professional knowledge and professional skills that would enable the accountant of 2024 to carry out successfully the range of work they expected them to be doing. The findings on professional knowledge and professional skills will be explored in greater detail in Chapter 6.

Interview findings

Accounting in 2014

At the opening of each interview, the participants were asked '*What does an accountant do?*' The purpose of this question was to provide a base on which to ground the answers to the questions that followed. An initial list of all activities was identified; however, there was general agreement amongst participants that the tasks/roles were context dependent. For example, an auditing firm will focus on audit and assurance-related activities, whereas an accountant in a corporate environment can be involved in tasks as diverse as transaction processing (bookkeeping) to Chief Financial Officer or Chief Executive Officer. The diversity of tasks and levels at which this may occur across all sectors (private, public, and not-for-profit) was also emphasised.

Table 5.1 shows the top eight functions identified including, not surprisingly, business advisory services as the most popular response. Business advisory services included responses that simply stated that accountants 'help people' run their businesses. This activity was ranked highest overall and by the Academics, Accounting Firm Employers and Regulators. Only Other Employers ranked this second. Financial reporting and disclosure involves a broad group of tasks, including some processing work. This was the second highest ranked activity for accountants in 2014. Tax and compliance work (which included all regulatory compliance activities) was often the second or third item on a list. Audit and assurance rounded out the top four activities.

Table 5.1: Accountant tasks in 2014 in rank order

Activity	Rank
Business advisory services	1
Financial reporting and disclosure	2
Tax and compliance	3
Audit and assurance	4
Diverse activities	5
Management accounting	6
Managerial tasks and roles	7
Risk services, governance	8

In many instances, the participants noted the evolving nature of accounting work, which has 'broadened somewhat in recent decades' (Academic B) and that accounting work involves numerous tasks and roles. The participants drawn from Accounting Firm Employers were best able

to articulate the diverse nature of accounting and its contexts. One noted that their day consisted of 'helping others' without specifically nominating the tasks involved (Accounting Firm Employer D). The emphasis on internal control of corporations, in a non-audit capacity, was represented strongly and one noted that '[accountants] control income and expenditure' and that staying 'on budget' was a primary responsibility (Other Employer B). This was reflected in other responses. For example, where accounting is 'the core financial control type work … and record management or the management of the results' (Other Employer G) and the preparation and management of 'the records of the company in order to convey certain information [to stakeholders] about the health and well-being of the company' (Other Employer E).

The strongest and most definitive answers regarding what an accountant currently does came from participants drawn from Regulators. A 'proper' accountant is a person who makes 'judgements and estimates' (Regulator A, Regulator H), whereas another interviewee gave a generic description of 'business advisor' noting this was not a 'bad description' of an accountant in 2014 (Regulator B).

There is broad consensus that the role of an accountant extends well beyond the areas identified above and there is clear involvement in related areas such as strategic management and advisory roles, actuary and insolvency, as well as cost accounting (and management accounting in general). The diversity of the tasks and roles being undertaken is significant. This means it is difficult to identify what an accountant does concisely and the nature of the profession is dynamic and changing, resulting in the trend of accounting firms being labelled as business advisors offering professional services.

Accounting in 2024

There was agreement that these areas identified above would remain core activities in the accounting profession in 2024. However, it is clear that technology has, and would continue to have, an enormous impact on the way in which these activities are conceived and undertaken. There was an emphasis in the responses to the shift offshore of routine transactions and the consequent disappearance of transactional processing from the mainstream work of the professional accountant. Outsourcing and automation was highlighted by two-thirds of the participants as immediately impacting on the nature of accounting work and the profession. This was highest for Other Employers suggesting that this stakeholder group may be more adaptive in response to technological innovations affecting the future of work. One participant noted that:

> There's a great number of people in the world today that operate under a title of accountant but aren't necessarily focusing on making judgements and estimates. They're people that I tend to think rather as bookkeepers and I think the bookkeeping world is going to be automated ... to a degree where it'll just happen rather than requiring much human work behind it. So I think the computer and progresses in technology will do away with the need for bookkeepers (Regulator A).

There is expected to be an advancement of the flexible and adaptable accountant into senior positions and a broadening of the purview of the profession to embrace a greater emphasis on value creation and informing strategic direction. Such transition would occur through accountants using their judgement and ethics to make and justify decisions, by interpreting the numbers rather than merely generating and reporting them, and through focused and effective multi-modal communication with internal and external stakeholders.

While 'accountants will still be critical strategic advisors to business … their role in analysing and interpreting financial information is likely to increase' (Academic E). Big data and information technology will be at the centre of accounting and, according to one interviewee, 'that's already starting to reflect in what [accounting firms are] doing and reflecting in what training [is needed] to … bring … staff up to that level' (Accounting Firm Employer B). Transaction processing will effectively disappear with another interviewee stating 'the number crunching part of … business is going to diminish with the data flows into the likes of a Xero package' (Accounting Firm Employer D). While 'the fundamentals of what accountants do will still be there' (Accounting Firm Employer F), the conduct of day-to-day business and 'the way [accountants] work with clients [will change] – so focusing more on the advisory type [services] as opposed to the more traditional type [of] basic … accounting' (Accounting Firm Employer E).

The time span of the next ten years seemed distant to some and for others significant change in accounting is likely in the next one to five years. For one, the next five years were expected to change 'dramatically' (Accounting Firm Employer H) while another had an even tighter time frame.

> I think *this year* is probably the next big change in terms of cloud computing and accountancy. I think the next frontier will be the removal of accountants doing that. Those day-to-day mundane type tasks, like reconciling bank [statements] and that the type of work, I think is ... going to disappear in the next two or three years I think' [emphasis added] (Accounting Firm Employer I).

Employers from both accounting firms and other organisations echoed this sentiment. One participant explained:

> If I use the analogy ... of driving a car, [the] good old-school accounting would be actually driving the car, looking in the rear vision mirror and, based on what was seen in the rear vision mirror… determine which way we turn the steering wheel. I think in moving forward for the accountants of the future, it is much more transformational: actually looking out the windscreen, being aware of what's happened in the rear vision mirror but certainly understanding what's coming up ahead and being able to assist the organisation in predicting and forecasting the future (Other Employer A).

Another interviewee agreed with this sentiment, stating:

> … [that accountants] will move to a much more strategic role in terms of working as a financial controller ... not just tracking of the higher level budgets but influencing efficiencies in organisation spend, improving supply chain and just higher level work (Other Employer B).

The skills of the accountant will therefore change according to a number of participants with an emphasis on communication, data analytics, business acumen and strategic thinking. However, one participant gave a word of caution on the future of accounting:

> That's a big question. I'm not sure. With technology and globalisation in Australia, I think there'll be fewer accountants in the marketplace. I think that there'll be more analysts of business. … You will still have the basic fundamentals of reporting but I think they're in more management [and] governance roles (Regulator C).

In light of this understanding of accounting in the future, the study turned to the challenges that the participants could see with accounting in business education.

Challenges for accounting education in the next decade

Participants were asked what problems they believed existed currently in accounting education and several themes emerged. While some aspects reinforce challenges that are well known in the sector, others will ignite new dimensions of the debate. It is hoped that key stakeholders will see these challenges as the stimulus for new policy imperatives and directions.

The Academics interviewed indicated that the most attendant issues were those centred on institutional structures and arrangements created by the pressures experienced in the sector. These pressures were largely the result of accounting's success in the international student market place. As is readily observable and as noted earlier, Australian skilled migration legislation and favourable employment market outcomes for accountants have contributed to creating and maintaining healthy enrolment demand. This demand has, in turn, produced unintended consequences for the higher education sector. The nature of these problems includes large class sizes and poor resourcing levels, particularly in comparison to other disciplines, and the tension between a focus on teaching versus research. One participant commented:

> The whole area is under resourced is one aspect to it because those changes that I've just mentioned there they can be quite resource intensive compared to the traditional educational model. And I think another key one that I identify is one that within the universities …people say the teaching is important but many people believe that the path to career success is in research. For that reason I think ... some accounting academics try to minimise the time, the effort they spend on teaching because that frees up more time to do research and see that that is where the career rewards will lie (Academic B).

Teasing out a similar range of problems within accounting education, another Academic interviewee was of the belief that time pressures cause academics to be efficient rather than creative with pedagogy. This Academic stated:

> … excess demand for accounting education places, inadequate resources, class sizes that are too large, programs that are still, perhaps ... kind of stuck in a rut of doing what we've always done ... I think, in the sector generally, we should think about changing the way we do things and the way students learn. I think [there are] very varying standards of programs that are on offer [and] competition from providers that don't have the kind of infrastructure to offer a deep and broadly diverse program (Academic E).

From a slightly different perspective a number of Accounting Firm Employers, while by and large happy with graduate attributes upon graduation, identified areas of potential improvement. One recurring theme was the adequacy of professional knowledge. However, professional skills and professional values, ethics and attitudes could receive greater attention. One interviewee noted:

> They will know the basics of accounting standards. They'll know the basics of auditing, [Corporations Act] and so on and so forth. I think where we could do things differently is around –I said the practical element and the – I guess, the career guidance piece in terms of helping students to think about where they want their accounting skill set to take them. So, that when they enter the big wide world after they finish university, they've got a clearer idea of where they want to go and what they want to do. I mean, I know, you can't – not everyone will have a clear idea and everyone's different and I absolutely understand and think that's a good thing. But to give people at least a bit more perspective when they leave, when they complete their degree the opportunities available, where they want to go so they got some direction, know clearly where they want to target their efforts, I think would be helpful (Accounting Firm Employer F).

If these constraints are viewed as challenges then the sector is potentially challenged by the nature and form of the teaching model presently used. In addition, the sector is also challenged by the resource allocation model, which is imposed on the sector by universities and government.

The connection between the academic and practitioner arms of the profession is an abiding theme throughout the interviews but only one participant highlighted this as presenting a challenge for accounting education. For this participant, the most significant concern identified related to the academics employed in the last decade and those to be employed in the future. The emphasis being placed on a PhD qualification or terminal degree, and the de-emphasis on professional accounting qualifications and/or other institutional memberships, meant that academics may no longer have links with the profession and that, potentially, the profession – that is, practitioners – were moving further away from academia. Connection to the wider profession is an issue of sustainability for both academia and public practice. The nature and strength of academics' association with their profession is a challenge for the sector that is more fully explored in Chapters 7 and 8.

Differing expectations amongst all stakeholders – students, academics, employers – was highlighted by many participants. While much of the emphasis was on the expectations of students and, according to one participant, the need to learn 'to crawl before they walk' (Accounting Firm Employer H) and achieving the right expectations 'going in' in the words of another participant (Other Employer G), it is equally the case that the expectations of employers – Accounting Firms and Others – need to be managed, including who has responsibility for preparing graduates for employment. This is especially apparent in light of the expected changes to accounting work, and the associated professional knowledge and professional skills, over the next decade. Managing expectations will also be considered in detail in Chapter 7.

Both Accounting Firm Employers and Other Employers see themselves as experiencing changes in their labour needs. As such, they see employing qualified accountants from the perspective of the end user or consumer of labour. This suggests that they see labour as a cost that must produce a return on investment and view skills shortages as an area of concern for both the sector and educators alike. Their needs specifically included that graduates be able to get the work done (professional knowledge). In addition, they value a raft of professional skills that is ultimately able to stimulate revenue growth. Interestingly, many Accounting Firm Employers and Other Employers were complimentary about the quality of graduates with one stating they felt that there were no 'glaringly obvious holes' (Other Employer D) in accounting education. Having stated this, other interviewees voiced their concern over quality and that graduates, according to one interviewee, 'were not up to speed' (Accounting Firm Employer D). Most participants in the study encouraged a greater connection between academia and professional practice to address the lack of professional skills development but there was acceptance that the employers have a shared responsibility for professional skills development and that it would normally take time for a graduate employee to contribute to an organisation's bottom-line.

Two questions from the interview are directly relevant to the future of accounting education in Australia. These issues are the proposed Federal Government reforms of higher education policy[1] and the identification of key stakeholders in accounting education.

[1]Details regarding government policy can be found in Chapter 1. It should be noted that the Coalition Government's deregulation proposals remain current policy although are not, at the time of concluding this study, being considered actively by Parliament.

Proposed reforms of government higher education policy

There was some support for reform of the higher education sector with one participant, for instance, seeing it as an opportunity for new entrants into the market to 'produce a product [graduates] faster – so get students through quicker and produce something cheaper' (Other Employer B). With such opportunities however, there was an acknowledgement that accounting is especially vulnerable to these new entrants, with private providers not carrying the expectations of research[2]. 'Accounting has [few] overheads relative [to] science, engineering, medicine, dentistry', and 'not such a high level of technical skills and training' (Other Employer B). Based on this perception, this interviewee believes accounting at universities is likely to experience significant negative impact should the reforms of higher education, as previously voted upon by Parliament, go ahead.

By contrast, another interviewee has 'never been worried about accounting schools' and the low cost of teaching means 'universities have used them as a bit of a cash cow' (Regulator D). Another regulator also referred to accounting schools as 'cash cows' of universities and, therefore, could not 'see them suffering' (Regulator B) with changes to government funding. A further interviewee agreed with the sentiment of this Regulator, stating that 'business and commerce degrees will be eternally popular' (Other Employer E). An Academic interviewee demonstrated a similar lack of concern over the impact of government policy changes for different reasons. 'The government already gives accounting very meagre funding' such that 'the impact on accounting is likely to be less than some other disciplines' (Academic B).

Many of the participants were concerned over the potential impact of the proposed changes for the students and the nature of the graduates. One stated that 'it's going to make it harder for graduates' (Accounting Firm Employer D). Others stated their opposition to deregulated fees that could result in making degrees 'unaffordable' and that people could be 'paying them off for their life' (Accounting Firm Employer K). One Regulator considered that in general terms the proposed changes were 'a bad thing … we want people to be better educated. You actually need the sector to be much better funded' (Regulator E). For another (Regulator G), the potential increase in fees raised issues of social equity (as for Other Employer D) with only those with sufficient funds being able to participate.

Some Academics had concerns about the direction that government policy may take education. Private providers 'don't have to fund research' (Academic A) and this makes them more nimble in responding to the market. This may require accounting schools to diversify their income streams by looking mainly towards international students and executive education degrees. On the other hand, one interviewee stated that the new government policy may have a positive effect on the quality of the education.

> Universities didn't have to bother; now they do. And so, that's a great thing because now we actually have some conversations about building the right curricula, the things that employers are looking for (Accounting Firm Employer G).

[2] Research appears to set universities apart from non-university providers. All of the participants in this study who responded to the question regarding employment preferences stated a clear preference for employing graduates from universities.

This participant considered that the 'stark reality' of accounting in Australia is that it is not globally competitive in the international labour market. Thus, education needs to embrace and understand a simple point – the current curriculum is 'dead'.

There were equal concerns, however, that the introduction of more competition from private providers, backed by government funding, may reduce the quality of accounting education. One interviewee felt that 'we run the risk of the quality of education … suffering by virtue of the economics' (Accounting Firm Employer F).

The question of the relevance of the curriculum is one that constitutes a persistent theme throughout the interviews. What presents as a relevant accounting curriculum is a question that several participants posed during the interviews, with one stating:

> …we've got to be really conscious and careful about not positioning things [accounting] as just the technical. It's that broader end-to-end value chain view which is really going to start to drive a point of difference (Other Employer F).

This statement represents a broader concern for accounting for the future than for the past.

For accounting in higher education to remain sustainable where such policy changes were enacted would, in the view of one interviewee, require significant reflection but:

> …anything that makes it more competitive and requires every player to think more heavily about what's going to be their competitive advantage or what's going to be their level of uniqueness … is good for [the] market (Regulator H).

Such a perspective recognises that competition, and particularly increased international competition, can be a driver of enhancing learning and teaching quality.

Key stakeholders in accounting education

In reflecting on the possible state of play in the future, it is important to pay regard to the perceptions of key stakeholders within accounting education during the second half of 2014. Such perceptions, for example, may not be seen as desirable or as preferable by policy makers or by the government itself. Reflecting on the responses by the study's key stakeholders provides a means of elucidating issues of concern and considering future policy and direction for the sector.

Interviewee responses to the question of key stakeholders in accounting education can be broadly divided into two categories – those who included reference to the students themselves and those who did not. For those interviewees in the latter category, the focus was on "consumers" of accounting education, which was essentially defined as employers in all their shapes and forms. Surprisingly, less than one-third (30%) of the interviewees included students in their lists of stakeholders.

Universities and their academic staff were also nominated as stakeholders in accounting education. As the providers of education, academics were identified by some as significant stakeholders. One interviewee noted however, that for some of this group, the mindset was not what it should be.

> I think one of the great tragedies of the academic sector in Australia and perhaps in other countries is that first-year teaching is deemed a punishment … for academics with ambition, when in fact, it should be seen as a privilege and it worries me that our best teachers don't always populate first year courses (Regulator H).

Another participant stated a similar attitude, emphasising the importance of professors in accounting faculties. For this interviewee 'the quality of professors is the be all and end all in my view' (Other Employer E). Another participant expanded the discussion to the university more

broadly, noting that reputations are 'going to be based on the quality of their graduates amongst employers' (Regulator G). Yet another interviewee identified senior management of universities as requiring specific attention and that they need to meet the employers 'face-to-face and hear the urgency and the desperation [of graduate employers]. I don't think that universities feel things are as urgent as they need to be' (Accounting Firm Employer G).

This interconnection between stakeholder groups was identified by many interviewees.

> I think the three of them [accounting academics, practitioners, and professional bodies] have an important role to play in terms of thinking about accounting education, what we do with it now and what we might do with it in the future and how it can be reshaped (Regulator I).

For another interviewee, this is clearly outlined in the respective roles assigned to two of the three parties (practitioners and academics) identified in the previous quote: 'It's up to employers to set expectations in terms of what we want, what we need and then to support the universities to deliver that' (Accounting Firm Employer F).

While employers were the key stakeholder group identified by virtually all of the interviewees responding to this question, some were critical of the current level of engagement. One felt that 'employers should be [a key stakeholder]. I don't think we are but I think we should be' (Other Employer H). As 'receivers of the educated students' (Other Employer A), employers assumed the most significant standing amongst the lists of key stakeholders, but there was some concern that the needs of employers were already well understood resulting in these needs being 'overstated or misdirected' (Regulator B). However, one participant felt that there was still an opportunity to ensure 'a bit more science around exactly what employers want and some sort of verification as to why and how they've come to that conclusion [is needed]' (Regulator H). Another was concerned that 'no one [is] questioning whether they [the graduates] come out with ultimately good skills' (Accounting Firm Employer H).

The concern regarding the quality of the graduates was raised by a number of the interviewees. Employers are seeking graduates who are ready for entry into the workforce and 'the more ready the people are, the happier we all are and the better the student can come in and integrate in to the workforce' (Accounting Firm Employer I).

This concern regarding graduate quality meant that one employer was 'underwhelmed' (Accounting Firm Employer K) with graduates at the interview stage. Greater engagement with a broader range of stakeholders may, therefore, be necessary and direct engagement with employers is warranted. 'Typically, what you do is you keep consulting the same stakeholders and that's only just ten per cent of the employers market' (Accounting Firm Employer G).

The stakeholders of accounting education are many and there is a concern evidenced that effective engagement with key stakeholders is not being linked sufficiently to the advancement and maintenance of a relevant accounting curriculum.

The evidence presented in this sub-section provides a frame for reflection on who benefits from higher education as a public good and may, therefore, contribute to the maintenance and development of the higher education sector in Australia.

Summary

That accounting is changing is not in dispute. Like many professions, it evolves in response to societal needs and changing technological landscapes. The accountant of the future will be both different and the same – largely similar core responsibilities performed in different ways but with

greater expectations of how accountants contribute to the success of organisations. As opposed to doing, accountants in the future will be expected to envisage and fashion new conditions for enhancing organisational value and prospects. The new reality should, most preferably, be seized and enjoyed as challenges, as identified by participants, for accounting education and particularly the academics who are responsible for initial professional development. The chapters that follow now consider a number of these challenges in greater detail, the first of which relates to developing the professional knowledge and professional skills of accountants-to-be in 2024.

Chapter 6: Professional knowledge and professional skills

Introduction

Accounting education, at universities and other higher education providers, is primarily concerned with the initial professional development of accountants. It is principally concerned with developing professional knowledge and professional skills and also with inculcating professional values, ethics and attributes (see, Chapter 7). Teaching accounting as technical *and* social practice provides future professionals with a broad understanding of the nature, roles, practices, uses and impacts of accounting.

Previous research has shown that graduates are typically well prepared in terms of professional knowledge in accounting but are less well equipped with the requisite professional skills (see, for example, Kavanagh & Drennan, 2008; Hancock et al., 2009). Work integrated learning in accounting, including internships and co-operative education degrees, is one key means of preparing accounting graduates who are anticipated to be 'work ready' (Patrick, Peach, Pocknee, Webb, Fletcher & Pretto, 2008). Graduate destination surveys[1] indicate that the enhancement of professional knowledge, professional skills and professional values, ethics and attitudes in graduates is a top priority for employers. The *Learning and Teaching Academic Standards Statement for Accounting* (ALTC, 2010), which includes communication, teamwork and self-management skills, demonstrate the importance of professional skills for accounting graduates (Hancock et al., 2009). Such skills are also incorporated into the CPA Australia and Chartered Accountants Australia and New Zealand accreditation guidelines as essential skills for accounting graduates (CPA Australia and Institute of Chartered Accountants, 2012). However, limited resourcing is evident in accounting schools, with deteriorating student–staff ratios, together with an often perceived lack of reward for excellence in the classroom and online, and serve as at least potential impediments to innovation to improve student learning outcomes and skills inculcation (Evans et al., 2010). Academic staff are increasingly focused on research development and performance in accordance with institutional and government directives, which contributes to a lack of incentives to invest considerable time and energy into teaching at the expense of research. Of course, teaching and research do not have to be viewed as independent of each other and there is a growing number, but still a relatively small population, of teaching-focused appointments in Australia (Evans, Burritt & Guthrie, 2010; Probert, 2013).

Background

The importance of developing accounting graduates' professional skills is not new to the literature. The Mathews Report (1990), as discussed in Chapter 2, provided a series of recommendations covering a broad range of issues for the accounting discipline in Australia, including the embedding into the curriculum of what in this study is termed professional skills. For example, these recommendations included the need for a broader education where computing and communication skills are embedded into the curriculum. The Report also recommended that there should be more integration of different disciplines into degrees so that accounting did not exist in a silo. The move towards capstone units by some higher education providers is an attempt to better integrate other disciplines into final year accounting degrees.

[1] See http://www.graduatecareers.com.au/research/start/agsoverview/ctags/gdso/for more detail.

Numerous studies conducted since the Mathews Report was published (see, for example, de Lange, Jackling & Gut, 2006; Hancock et al., 2009; de Lange & Watty, 2011) have examined the knowledge and skills sets of accounting graduates. In addition, the revision and mandating of the AQF has occurred (Australian Qualifications Framework Council, 2013). The AQF provides requirements on the knowledge level, skills and application of knowledge for all types of qualifications including Level 7 (Bachelor) and Level 9 (Master). The professional skills addressed cover a range of cognitive skills including critical analysis, ability to synthesise information and communication skills.

The relevant studies published in Australia in the past ten years, which examine issues facing accounting in business education (see, for example, Jackson, Watty, Yu and Lowe, 2006; Freeman et al. 2008; Hancock et al. 2009; O'Connell et al., 2010), included coverage of the professional skills expected to be possessed by accounting graduates. In each of these studies it is acknowledged that the world is ever-changing and that the rapid change currently being experienced means it is critical for accounting educators to be aware of the skills required by accountants in professional practice to add value in dealing with the affairs of their clients and employers (de Lange et al., 2006; Kavanagh & Drennan, 2008).

The relative importance of professional skills, which encompass intellectual, interpersonal and communication, personal and organisational skills (IES 3) is demonstrated in the Graduate Outlook Survey (Lindsay & Edge, 2014). In the 2013 survey of employers, professional skills were involved in the four most important selection criteria in accounting and finance (see, Table 6.1).

Table 6.1: Selection criteria by importance and industry 2013

Selection Criteria	Accounting and Finance Ranking	All Industries
Interpersonal and communication skills (written and oral)	**1**	**1**
Passion/knowledge of industry/drive/commitment/attitude	**3**	**2**
Critical reasoning and analytical skills/problem solving/lateral thinking/technical skills	**2**	**3**
Calibre of academic results	**5**	**4**
Work experiences	**7**	**5**
Cultural alignment/values/fit	**4**	**6**
Emotional intelligence (including self-awareness, strength of character, confidence, motivation)	**5**	**7**
Teamwork skills	**8**	**8**
Activities (including intra and extra curricular)	**9**	**9**
Leadership skills	**10**	**10**

Source: Lindsay and Edge (2014, p. 28).

Interpersonal skills include the ability to organise and delegate tasks, motivate, resolve conflicts, and enhance client relations and decision making (Kennedy & Dull, 2008; Ballantine & Larres, 2009; Awayiga, Onumah & Tsamenyi, 2010). There are many aspects to communication skills, including the ability to easily transfer and receive information, listening effectively to learn and gain information, understanding differing points of view, and having the ability to present ideas and concepts both in writing and orally to both specialist and non-specialists and to do so individually and collaboratively (Rebele, 1985; Arthur Andersen, Arthur Young, Coopers &

Lybrand, Deloitte Haskins & Sells, Ernst & Young, Peat Marwick Main & Co., Price Waterhouse & Touche Ross, 1989; Ballantine & Larres, 2009; Hancock et al., 2009; Awayiga et al., 2010; Fortin & Legault, 2010; Tempone, Kavanagh, Segal, Hancock, Howieson & Kent, 2012).

Based on their study in China, Wu and Chien (2004) voiced concerns that insufficient engagement between accounting professors and practitioners may result in a failure by educators to ensure that their teaching is relevant to the needs of employers. These concerns are not peculiar to China and can be observed in other countries or regions, including Australia (de Lange & Watty, 2011) and the UK (Puxty, Sikka & Willmott, 1994) among others. The *Achievement Matters* project[2] in Australia involves both accounting educators and practitioners and provides accounting educators with an enhanced understanding of the learning standards expected of accounting graduates, particularly the importance of professional skills (Watty et al., 2013). Yong, Ryan, Yap and Goela (2011), reporting on a postgraduate accounting degree in Australia, find the degree has a very clear focus on professional knowledge to the detriment of the professional skills required by employers of accounting graduates. Given the large number of students enrolled in the degree for whom English is an additional language, the authors found that there was no evidence of an increased focus on communication skills. The authors comment that 'it is out of line with twenty years of reports on accounting education and with the widely publicised standards for accounting education' (Yong et al., 2011, p. 392). A reason for this may be due to resource constraints and/or competing demands on the typical accounting academic, such as the need to produce and publish research.

Interview findings

Understanding the skills and values to be possessed by accountants in the future, including professional knowledge, professional skills as well as professional values, ethics and attitudes is considered central to any reform of accounting education. This section considers the participants' responses to questions on the professional knowledge and professional skills required of accounting graduates and achieving a balance between them in the current curricula. This section will be followed with a summary of the key ways forward identified by the participants and which will inform the recommendations contained in Chapter 10.

Professional knowledge and professional skills

All participants were asked what they felt would be the professional knowledge and professional skills to be possessed by accountants in 2024. As noted in Chapter 4, most interviewees were of the view that many basic and routine accounting functions will either be automated or outsourced; a trend which is presently growing. As a result, graduates will need to have professional skills, including data analytics, and be employable when they graduate. Technology is discussed more fully in Chapter 9.

Professional knowledge

Professional knowledge was discussed by all participants with approximately one-third of the interviewees discussing this topic first in their response. Professional knowledge encompassed a number of disciplines and the various accounting and auditing standards, including IFRS, which

[2] For more information on this project, visit http://achievementmatters.com.au/.

were singled out by some for specific attention. One participant characterised professional knowledge as 'basic training' (Other Employer B), another as 'technical know-how' (Accounting Firm Employer B), with another considering it as including an 'understanding of what the numbers mean' (Accounting Firm Employer D). This view was reinforced by a number of other interviewees. One participant explained the dimensions of professional knowledge as:

> A traditional set of knowledge requirements as being in economics, finance, accounting, stats/maths, law and IT. They are basic to virtually everything that anybody does in accounting. Then there are the social or humanitarian level, things like history, language, literature, social studies, political science is another dimension … then the third level is research philosophy and methodology (Regulator B).

This interviewee felt that the social and humanitarian levels of professional knowledge were 'being crowded out' of degrees and the 'third category [is] not well served yet'. But, most importantly, all three categories of knowledge would be needed in 2024.

Professional knowledge will remain a critical element for accountants in the future. While professional skills were more commonly discussed (see the next section), professional knowledge remains an important, essential, aspect of the accounting profession, as one participant noted:

> In terms of minimum competencies, it's weird – even though accounting is changing, accountants will still need to know their debits and credits. I don't think there's any way of getting past that because if you understand your debits, credits, if you understand that an asset is a debit and then the liability is a credit then, I guess without that, you could never give, no, not never, but I think it will be very difficult to still give the advice or work in that advisory or consultant role that accountants will have going forward (Accounting Firm Employer I).

The trend of accountants moving away from routine transactional work was commented upon by a number of participants. One interviewee stated:

> I can see us doing less and less transactional work because slowly but surely, we're all getting to a common point in terms of automation and more intelligent systems, and so on (Other Employer E).

Another participant added that offshoring arrangements had involved

> …people [offshore] mainly get things into spreadsheets for us to analyse', meaning that newly-appointed graduates in the future will 'have to hit the ground running a lot quicker because at the moment, they can be doing some really basic tasks for the first six months. I think we'll expect more of them when they walk through the door (Accounting Firm Employer K).

Such work trends do not in any way undermine the importance of professional knowledge in accounting but rather highlight the need for accountants to use, interpret and analyse information in a plethora of contexts.

It is, therefore, the general consensus of the participants, that professional knowledge, whether broadly or narrowly defined, will remain part of the competencies required for professional accountants into the future.

Professional skills

Professional skills, as noted in Chapter 1, cover a range of areas. For the participants of this study, professional skills were broadly seen as falling into two key categories: those skills required for using professional knowledge and those required to interact and work effectively with colleagues and clients. In addition, a number of skills were noted that are more suitably classified as relating

to the inculcation of professional values, ethics and attitudes and, as such, will be considered in the next chapter.

The professional skills required to use professional knowledge for meeting clients' needs included critical thinking, problem solving, data analytics, regional and global strategic thinking. This sub-set of professional skills was the most commonly cited amongst participants. With the future of work being heavily influenced by the adoption of key enabling technologies, the ability for accounting graduates to adopt a 'project management' (Academic F) style approach will become increasingly important as workplaces, clients and problems become located in disparate places, with requirements for more customised advice for specific purposes rather than advice and support of a more general nature. Interpretation will be a primary responsibility – not the mere generation of the numbers themselves. Thus, being analytical assumes greater importance in business advisory roles. However, this re-orientation of focus is not something that is necessarily easy to achieve. One participant noted:

> We're struggling with that shift to move away from the things that we know really well, which is making sure the numbers are right and you're doing the ticking and bashing and reconciling to actually providing some meaningful analytics. So it's about being able to understand the business well enough to know where to look, where to draw information and come up [with] some conclusions and recommendations and some analytics to be able to direct the business (Other Employer C).

Mirroring this concern, an academic interviewee perceived that there was a lack of effort at universities in developing this skill type, particularly from a whole of degree approach.

> We teach them cost accounting in cost accounting class, we teach them intermediate topics in an intermediate class, we teach them tax in a tax class, but we don't teach them that there's a business problem that has cost accounting, financial accounting and tax accounting issues, they just parrot an answer based on a class that they're in (Academic C).

Another interviewee noted a concern about over-emphasising technical processing work and bringing too much focus on attention to detail.

> I have a particular view about accountants as analysts and that is sometimes the attention to detail that gets recognised and rewarded early in an accountant's career [that] can become a barrier later on as they develop and, perhaps, fail to get career advancement … They can only see the wood [and not the forest] and as a consequence, can't make the choices about relevant data or relevant detail from irrelevant detail. They find it hard to make decisions because they're used to seeing all of the detail. And so as I look at accountants for promotion, that's a very important characteristic, someone who can actually pull themselves out of the detail and make those decisions. As with all professionals, you're also looking for, it's essentially pure intelligence but abstract reasoning skills (Other Employer E).

The underlying message from the responses was the need to be able to find the answer, not merely to recall it from a particular source, such as an accounting standard. In addition, once having developed an answer, being able to communicate it effectively to an audience was also emphasised by the participants. With rules and standards changing constantly, being able to recall a specific paragraph or sentence within a standard is not necessarily feasible or the solution to a problem. Rather developing and refining the relevant skills necessary to navigate and interpret those standards for application in specific organisational contexts and to discern and communicate an answer is more important.

Of greater importance and emphasised by the participants was the second category of professional skills – those related to interacting with clients and colleagues. Communications skills were most

often cited by the participants. As one stated, 'you've got to be able to communicate, you've got to be able to write, you've got to be able to talk' (Regulator I). Many participants felt that interaction with people will be the defining characteristic of accounting in the future, particularly in light of automation and offshoring of transactional tasks. Thus, professional skills such as building rapport, knowledge of the psychology of decision making, getting along with others, people management and social skills were all highlighted.

> I actually think people skills are going to be probably the most important thing going forward. I think gone are the days where you have – you employ someone who's the nerd and sits in the corner of a room and plays with spreadsheets. I think accountants going forward are just going to have to have much better people skills [and] being able to communicate (Accounting Firm Employer I).

With both professional knowledge and professional skills clearly of importance to the interviewees as a whole, the challenge for educators is to achieve an appropriate balance between them.

Balancing professional knowledge and professional skills

Interviewees were asked to specifically consider the balance of professional knowledge and professional skills. Less than half of the participants considered there was an over-emphasis on professional knowledge over professional skills – more strongly amongst the accounting firm employers than for other participant groups. However, there was a widely held view that accounting graduates must possess both professional knowledge *and* professional skills. Academics did not identify professional knowledge as being especially important compared to Accounting Firm Employers, Other Employers and Regulators. For instance, one Academic noted:

> …employers always tell us that don't worry too much about too many technical skills, we'll train them when we get them but, you know, we want students who can write, we want students who can articulate an argument, we want students who can present, we want students who can work in teams (Academic A).

Of interest in a small number of interviews was a sense that there is a level of professional knowledge content that is wasted – notably in relation to the teaching of accounting consolidations. It was felt that consolidations is essentially niche technical knowledge, performed by few in professional practice, yet continues to be repeatedly taught, often in a suppressed way.

> I can't work out why people need to do consolidations. It's just nonsense. There would be only a handful of people in Australia that need to do consolidations in their work practice. It'd be more important for [them] to do a history of the economy, or accounting thought, or contemporary accounting developments (Regulator I).

There is also evidence that the simplification of accounting (possibly as an outcome of commoditisation) is affecting the quality of the accounting graduates. One Academic stated in respect to consolidation accounting 'I teach corporate accounting … it's incredibly simple [we] never go beyond the two entities, the parent and the subsidiary' (Academic F).

The main message flowing from the interviewees is the need for balance between professional knowledge and professional skills and that while an expansion of professional skills is required, it should not, in general, be at the expense of the development of professional knowledge. One interviewee called for:

> A restructuring or understanding what is technical and what's non-technical. I wouldn't overemphasise the softer skills, but I think it's about rigorously seeking more clarity around

> what are the skills required in the future and tailoring the curriculum around that (Other Employer C).

Around one third of interviewees called for a greater integration of the "real world" into education – the context of accounting, practice issues and practice management. This greater contextualisation, including the understanding of accounting as social practice, would aid in managing expectations about the work being performed and grounds the professional skills into the organisational and social contexts in which they will be exercised.

> The key competency that I want from this pool of people that will have gone through this education is the technical side – so that's got to be front and foremost. I do think there are ways of integrating generic [skills]. I'm not saying that that's not there at the moment, but there are ways of integrating it without it being at the expense of technical … I'm looking at [this] from our business perspective – is how do we teach that technical but as a secondary objective work on the networking, the presentation skills, the communication. We're playing around with those ideas so I certainly wouldn't ever suggest putting non-technical in at the expense of technical but I think we can be clever [about it] (Accounting Firm Employer B).

Academics and Regulators noted the constraints associated with a three-year degree structure. While some called for longer degrees, either four or five years, others noted that an increase in the contact hours within three year degrees could be used to increase content and better prepare the students for the realities of practice hours. One interviewee (Other Employer A), for example, noted that:

> I sort of joke with my [partner] who did [health sciences], but I think she had 28 or 30 contact hours a week and I remember when I did accounting it was 16 contact hours. It doesn't take a huge amount to say 'right, how about we add an extra six hours a week and to then support those extra six hours with the generic skills.

The process of how professional knowledge and professional skills are taught was raised and whether there should be a move towards processes (rather than right or wrong) and competency-based assessment. Again, institutional constraints were raised, including the academics and their preparedness to change methods of teaching and assessment, class sizes, and identifying priorities.

Academics tended to question the quality of the teaching of professional skills and that, in some instances, integration is effective but, in other cases, some instances of poor quality teaching remain (Academic F). There is a sense that institutions need strong leaders with vision and engaged academics who are willing and incentivised to implement the actions and strategies for the balance between professional knowledge and professional skills to be achieved and to a generally higher standard that more fully prepares graduates for the workplace, whether public practice, government, commerce or other areas.

> The short answer I think is there is still an overemphasis on technical … in the sense that it's the easy way out … Certainly there's more interest and a trend towards developing other types of so-called generic skills. I think we've still got a long way to go in that. But, for me, the whole sort of thing has to be integrated… into a package in a context of accounting. I think we're only really starting to see isolated examples of people getting that idea that if we're going to teach communication, it's actually got to be in the context of some accounting scenario (Academic F).

The Academics interviewed were all well aware of the challenges facing them as educators in trying to help students develop professional skills and be work ready when they graduate but this was recognised as a real challenge.

A number of universities have internships or some other form of work integrated learning to try to develop work readiness but this is not always scalable, especially at capital city based providers, when there are hundreds or even thousands of accounting students to accommodate. Other strategies used by some educators to enhance work readiness include the use of case studies and guest lecturers.

> What was more interesting and the Institute did this for a short time, had a couple of practitioners come in and say "right, well there's this new standard out, this is what it might mean for some of our clients and here's the situation where it was a bit more difficult and we had to make" ... So that you had some real world application that you can then take away back into the classroom and get students to think about (Academic F).

Accounting Firm Employers had concerns about the lack of specialisation offered in accounting degrees. This is on the basis that skills and competencies required in graduates and employees are different according to the area in which they practise. While this applies to both professional knowledge and professional skills, it is regarded as especially so for the former. All employers identified professional skills as required/expected. However, one participant in this category noted that 'in the business world, I'm never going to ask someone to do a presentation that has absolutely nothing to do with technical skills' (Accounting Firm Employer B). Articulation of professional knowledge was repeatedly emphasised by the employers and identified as an area where there was at least some scope for improvement in accounting education. One interviewee noted that the development of a mindset of 'seeing it's not just a number' was as important as the technical knowledge itself (Accounting Firm Employer A).

Underpinning professional knowledge and professional skills is the question of who has the responsibility for educating accountants and for what[3]? Therefore, what are the relative roles for universities and employers? Howieson, Hancock, Segal, Kavanagh, Tempone, and Kent (2014) reported a range of views among students and employers about the respective roles of universities and employers in the education and training of accountants. How far does education need to go (that is, basic, intermediate or advanced skills)? The Accounting Firm Employers generally expected the students to reach at least the basic level in both professional knowledge and professional skills. One interviewee (Accounting Firm Employer E), however, noted that partners/firms had differing expectations and that greater industry engagement with universities may provide some clarity on these expectations. Another interviewee (Other Employer E) raised the question of who is better placed to deliver competencies/skills and that this conversation needs to take place with stakeholders. Are universities better equipped for teaching the technical aspects? These are central questions to be addressed as graduates enter the labour market unprepared or not fully prepared (that is, work ready) to meet the expectations of workplaces. One interviewee effectively posed the question of whether students fully appreciate the importance of professional skills to their futures (Regulator F), echoed in the comments of another participant:

> The other thing which … and I'm not sure how widely it's done is the summer intern programs, and I think there's almost this onus on us [practitioners] to do that because [in] a two- or three-week [visit], they're not really going be doing any work but they do get the opportunity to observe. I know our organisation does offer that, but I'd be encouraging other organisations because when you're in an academic environment it's often hard to

[3] As indicated in Chapter 1, the focus of this investigation is on the initial professional development of accounting professionals within the realm of higher education.

> contextualise well … I think it's important to give a little bit of context, but then encouraging the graduate or the people studying to go and get that work experience (Other Employer G).

Linked to these questions was the notion of where indeed does one's learning end. All participants implicitly or explicitly agreed that learning is a lifelong process – a hallmark of a profession. However, there was a sense from some of the participants that students believed learning ended with a Bachelor degree qualification. With professional degrees and continuing professional education requirements for accountants, learning is never complete. Therefore, do universities have a responsibility primarily to teach graduates not what to learn but how to learn?

> So, we look at our graduate program – the graduates coming in, they could be in very diverse roles and although we rotate them through roles, ten graduates all with four rotations might get at the end of three years and not have done similar things … So I would discourage trying to get too [much] on the job ready training, but it's more focusing on getting the thinking right, the attitude towards what being a successful accountant is required, and on the job will happen pretty quickly if they've got the right expectation going in at the early stages. And also the ability to self-research, think outside the box or [to pose challenging] questions (Other Employer G).

Ways forward

Participants suggested strategies for higher education providers to produce graduates who possess the professional knowledge and professional skills required for 2024. There is a level of concern amongst the participants about the relevance of accounting curricula to present and future environments. While accounting schools in Australia do provide many of these types of initiatives, their prevalence varies across institutions and within degrees. Some suggestions were:

- remodel and broaden what students are taught and assessed;
- greater use of work integrated learning initiatives[4] and related learning strategies including integrated case studies;
- greater involvement of organisations, firms and alumni in the classroom and online;
- integrate professional skills development across curricula;
- instil the capacity to analyse and interpret big data and enhance information technology knowledge and skills across curricula; and
- greater focus in curricula on social, environmental and ethical aspects of accounting.

The responses emphasise that graduates will need to have better developed professional skills to succeed in the workforce in the future and that they will increasingly need to be widely recognised as work ready when they graduate. In particular, they will need to be able to understand, use and interpret data, to analyse reports and interrogate their preparers, and to provide sound suggestions and advice for value creation purposes as well as be effective communicators, negotiators and conflict managers in different contexts.

Students need to have a strong appreciation of the type of world into which they will enter as accounting professionals, including social, environmental and ethical aspects of the workplace and a strong understanding of, and respect for, the expectations of employers, clients and other key

[4] Internships are used in the Skilled Migration Internship Program (SMIPA) and are an effective method of education recognised in many sectors and disciplines, see http://www.cpaaustralia.com.au/become-a-cpa/migration-assessment/smipa or http://www.charteredaccountants.com.au/The-Institute/Migration-assessment/Skilled-Migration-Internship-Program.aspx.

stakeholders. In particular, they need to appreciate fully the impacts that accounting numbers and reports can have on the behaviour of people and on organisational culture and, more generally, in the shaping of communities and society in general. As indicated earlier, the understanding of accounting as social practice, rather than as technical practice, permits students and graduates to appreciate the enabling and disabling characteristics of accounting and to access its implications for organisational and social functioning and development.

Summary

This chapter reports findings that are broadly consistent with earlier studies, whereby accounting students need to be more than simply technically competent. Accounting graduates must be critical thinkers with good communication and people skills. The increasing automation and outsourcing of basic recording of transactions and the preparation of financial reports will increase the demand for higher order skills of graduates. They will need to be capable of understanding, interpreting and analysing financial and non-financial information to provide business advice and strategic direction to employers and clients (both accountants and non-accountants alike).

The challenge for accounting educators is to be able to integrate the development of a wide array of key professional skills into the delivery of professional knowledge with increasing class sizes and fewer resources, as well as greater use of online learning platforms. The increasing number of students for whom English is an additional language without a proportionate increase in resources to help embed and improve communication skills compounds the problems for accounting educators in the context of business education. One possible reason for this, raised by some of the interviewees, is that many accounting academics are not actively engaged with professional accounting practice or possess little up-to-date experience of what is happening in practice and within industry. The result is a perceived disconnect between the accounting curriculum and accounting practice. However, the use of work integrated learning and case studies are ways of reducing this purported disconnection as well as better positioning accounting as social practice rather than as technical practice only. These ideas and others are explored in more detail in the recommendations in the final chapter.

Chapter 7: Professional values, ethics and attitudes

Introduction

Accounting educators have a principal responsibility to educate and develop future accounting professionals for success in an international context (Helliar, 2013). Students need to have a strong appreciation of the type of world into which they will enter as accounting professionals, including social and ethical aspects of the workplace and a strong understanding of the expectations of employers, clients and other key stakeholders (Sin, Reid & Jones, 2012). Under the IES, professional values, ethics and attitudes:

> …include a commitment to (a) technical competence and professional skills, (b) ethical behavior (e.g., independence, objectivity, confidentiality, and integrity), (c) professional manner (e.g., due care, timeliness, courteousness, respect, responsibility, and reliability), (d) pursuit of excellence (e.g., commitment to continual improvement and lifelong learning), and (e) social responsibility (e.g., awareness and consideration of the public interest) (IES 4, para A4).

Heightening an awareness of these professional values, ethics and attitudes presents a challenge to accounting educators as to how best to incorporate them into the accounting curriculum in business education. As accounting academics increasingly have less experience of professional practice themselves (Beattie & Smith, 2012), accounting students may not gain sufficient exposure to the dynamics and intensity of professional accounting practice.

Professional values, ethics and attitudes in the literature

The professional knowledge and professional skills that students acquire through their education is shaped by their conceptions of work and perceptions of the profession itself. How well students adjust to working life is related to the extent to which they internalise professional values, ethics and attitudes during their undergraduate education (Sin et al., 2012). Educators may need to combat any negative stereotypes about accounting, assist students to have a thorough understanding of the profession, and help shape positive perceptions of the profession in students before they complete their degrees. Situated learning, field trips, internships and work integrated learning can habitualise actions and values so that they become routine, where the work becomes understood and where the personal experiences (of both teacher and student) can be shared (Reeves, 1990; Kakavelakis & Edwards, 2011; Ahmad, Anantharaman & Ismail, 2012; Tonge & Willett, 2012). The reinforcement of professional values, ethics and attitudes in the classroom or online will, over time, result in students sharing the values of the professional accounting community into which they may later enter, making them fit in and stay in the profession (Moosmayer, 2012). Such professional socialisation is a precondition of success in practice and in individual organisations (Ghoshal, 2005; Moosmayer, 2012). Students have characters that are malleable as they encounter entering a profession that may exert a powerful socialising influence over them (Hartman, 2006). Thus, student expectations need to be moulded around the actual needs of the profession.

Accounting academics may lack current professional experience thus making it difficult to inculcate professional values, ethics and attitudes into their students. It is now common that academics require a PhD for them to be considered for full-time appointments at universities. However, a PhD (in accounting) does not require any professional experience. Therefore, there is a danger that recruiting academics without professional experience may widen the research–practice

gap and potentially decouple students from relevant professional engagement (Njoku, van der Heijden & Inanga, 2010).

The Mathews Report (1990) considered the qualifications of accounting educators over a 20-year period, ascertaining that accounting academics' qualifications lagged behind other disciplines in terms of higher degrees. The Report identified that 80 per cent of engineering academics held a higher degree, compared to only 66 per cent of accounting academics. Accounting academics usually had either a Bachelor degree or a coursework Master degree rather than a research degree and only 15 per cent of accountants in academia held PhDs. One recommendation from the Mathews Report was to improve the ratio of PhD-qualified academic staff. This ratio has dramatically increased since (see, Duff & Marriott, 2012; Beattie & Smith, 2012) and a PhD is now an essential qualification for career academics. The challenge, therefore, is to maintain both PhD-qualification and current experience of professional practice.

Students themselves need to develop professional knowledge and professional skills that come from their everyday lives not just from their university education. Educators are role models for students and should be aware of their own values and any potential conflict with the professional values, ethics and attitudes they should impart (Moosmayer, 2012). They should also not impose their personal values on others (Steiner & Watson, 2006). Being a professional requires individuals to have the courage and justice to stand up to others and act ethically and with integrity (Helliar & Bebbington, 2004) and to have empathy and a concern for fellow humans (Steiner & Watson, 2006). Further, personal values shift through experience and as events unwind. For example, Moosmayer (2012) notes how economic values were promoted over environmental and social values at British Petroleum (BP) thus contributing to the Deep Water Horizon oil spill in the Gulf of Mexico. Such events can be captured and used to illustrate professional values, ethics and attitudes and their failures. However, academics may also exert self-censorship and focus only on safe values or topics (Bell, 2009). The topics taught may be shaped by organisations offering accreditation, with a narrow focus on the mere technical aspects of a discipline, for example, ethics training is part of this socialisation process but this area of education is often neglected or stigmatised (Giacalone & Promislo, 2013). Given the ethical failures associated with Enron and other corporate collapses (Jennings, 2002; O'Connell, 2004), it may be unsurprising that there is a sense that accounting and business schools have failed to inculcate the appropriate values in their graduates, reflecting a disconnect between practice and academia (Jackling, Cooper, Leung & Dellaportas, 2007). Indeed, Bloom's affective domain taxonomy covers the continuum of internalisation from receiving to responding, to valuing and organising to then being characterised as having these values intrinsically embedded (Reeves, 1990). University accounting schools need to embed this continuum of internalisation into the curriculum, despite it already being full of mandatory technical requirements. Thus, the shaping and focus of the curriculum needs to adapt to this changing environment.

Interview findings

Attitudes

Many of the qualities identified by participants in identifying the necessary professional knowledge and professional skills required in the future are more correctly classified as being a part of professional values, ethics and attitudes. Other areas that interviewees mentioned as being traits that were needed by graduates were resilience, curiosity and innovation. One interviewee noted that 'resilience can be learned, I think curiosity is something that's embedded' and

commented on the need for 'curiosity and innovation and all those things ... because we need people to change and challenge' (Accounting Firm Employer K). Some values were learned as people matured, such as being curious and making judgements about accounting matters. One interviewee explained 'I can't remember being particularly curious about finding an answer to an accounting problem whereas now I am' (Accounting Firm Employer K).

Another interviewee regarded successful institutions in the future giving their students:

> …the confidence to see a something that they are not familiar with' as 'they are going to have to apply new standards, that shouldn't be a frightening thing, that should be, yeah, I know how to do this, what's the requirement, OK, what's the economics? What's the information need? Now using our framework let's make reason through the necessary judgements to apply the requirements … If you want people to make judgements and estimates you have to train them to think. You can't do that by them just lecturing to them. I think you need to get them in groups where they discuss and put forward their opinions and reason through their arguments (Regulator A).

Managing expectations

One theme emerging from the interviews was the need to manage the expectations of both students and employers. A number of the interviewees noted that there exists a generational difference between employer and potential employee. Some believed that this has resulted in some students becoming unable to fend for themselves and that perceived "spoon-feeding" of students should stop. One interviewee noted:

> There's almost an expectation that they'll be told exactly what they're going do so they'll be spoon fed. You're now working for me and Monday morning you're going do this and you'll do that and then you'll do that and then you'll have had a successful day (Other Employer G).

This interviewee also felt that there is an expectation that 'everything will be very clearly laid out', which may be caused by the university assignment process:

> There's no greyness in the assignment that's given to university students, they expect every assignment will be very clearly laid out. In a workforce there are time constraints and … dynamics … Life isn't specific (Other Employer G).

However, the work that will be done by students in the workplace is dependent on the type of employer as 'not everyone is the same' and there needs to be an appreciation by employers of 'the differences in who you'll be working with' in the workplace (Accounting Firm Employer B). Employers need to realise that their own staff, including graduate trainees, were different from each other. As one interviewee noted 'every professional services firm has a different culture and a different way of working and a different set of values' (Accounting Firm Employer B). Thus, understanding the 'nuance of [organisational] culture' (Other Employer F) can be problematic for students, even though most students recognise that the 'work environment post university will be "9 to 5", it's tough, you've got to be a sponge and you've got to learn' (Accounting Firm Employer H).

Another agreed that different roles and employers had dissimilar requirements and practices. The interviewee noted that 'sometimes they're shocked that they go out to a client immediately. Sometimes they're shocked that they don't get to ask client questions immediately' (Accounting Firm Employer K).

Graduate expectations also varied as some wanted 'to be CEO [on] day two' and it is a question about 'how do you in a very nice way reset expectations?' (Other Employer A). Another

interviewee noted that some students thought 'I didn't spend three years at university to do that!' (Other Employer A). This interviewee clarified:

> You've got to start somewhere and you've also got to understand that success is something that comes with experience and wisdom and you've got to be frank and do the [uninteresting or unappealing] jobs before you get [to] the good jobs (Other Employer A).

Some interviewees thought that the values of the profession had not been inculcated into graduate trainees, including traits such as 'professional demeanour, wearing a suit' (Accounting Firm Employer K). Dress codes, 'using acronyms and texts' (Other Employer G) all resulted in students being 'naïve as to what the profession is until they graduate and they get into their job' (Regulator G). Students have not grasped the 'political nature … and landscape' that they needed 'to start to navigate' (Other Employer F). Thus, it is essential that the education process 'helps students to understand what their profession is, what their profession does, the standards their profession requires, [and] the repercussions [if] they don't act professionally or ethically' (Regulator G).

From the employers' perspective there was also a view that they should be prepared to adjust their expectations. For instance, three interviewees thought that employers should provide induction and training programs for new recruits, as exemplified by the first of these.

> It falls to the professional services firm to work with their new joiners to design and enhance their culture in the way that they want rather than assuming that there's a one size fits all (Accounting Firm Employer B).

A second interviewee noted that:

> I think we've got to recognise that if we are going to take someone straight out of university we do owe it to them to give them the strong foundations for their career by providing introductory kind of soft [sic] skills training rather than just throwing them into the deep end with a whole lot of data (Other Employer D).

Another participant stated:

> Every role is different and so there's always going to be a learning curve and there has to be training within the organisation whether it's simple sort of on the job training or whether it's induction courses and all of those sorts of things. So I think it's impossible really to cater for every possible situation (Regulator E).

One academic offered a pragmatic view of graduate employability reflecting on all the different contexts in which graduates are employed.

> We're not going to be able to produce [someone] that's ready for everything, so some might be more work ready relative to the employer they go to than others are, but that's dependent on the type of employer (Academic F).

Hence, graduates should have a basic level of skills, and employers should then mould new staff into their own culture.

> So it's almost just allowing everyone to at least come in with a minimum standard. I think that'd just be good training ... So it's kind of tempering your behaviour. But we're not seeing it as being a fundamental flaw coming out of the graduate class (Other Employer G).

To some extent this was dependent upon the previous work experience of the students and whether they had worked in the profession before, as demonstrated by the following two quotes.

> I think that some students have a very good idea but most don't. And that is because they haven't worked in the industry before. So in all these cases that is what I would expect (Other Employer H).

> In my division, we haven't had any graduates [who] haven't been work ready because they've all come and they've all had an interest in vacation work (Accounting Firm Employer J).

To some extent this was the case for all employers, not just accounting.

> A broader point about just basic professionalism and what – the difference from moving from their university's phase into a professional work environment. So I'm not sure that's unique to accountants (Accounting Firm Employer F).

To manage expectations and ensure that professional skills and values are embedded in students, the profession itself can be used, through a close connection and dialogue, with education providers.

Connection between academia and the profession

Improving the engagement and dialogue between educators and practitioners was mentioned by all the interviewees. The interviewees noted that some full-time academics and lecturers did not have recent experience, if any at all, of the profession as demonstrated by one participant who noted that 'a lot of employers just wait and just expect that [academics] are great at mind reading' and know exactly what the profession wants in graduates (Other Employer A). A key way to manage graduate expectations is through more engagement with business and encouraging guest speakers to come in from the profession 'who can set a good example and get across to students their expectations' (Academic B). These guest speakers could talk about 'what they look for in graduates, giving some good examples of successful graduates' (Academic B) and allow students to ask questions and find out more about 'what they're getting into and being committed and heading in the right direction' (Accounting Firm Employer D).

Running sessions with executives or practitioners in full lecture theatres was considered successful, whereby someone from outside 'gives a few war stories' (Academic F) and so students can associate themselves with that practitioner. One interviewee noted that 'it might be far more appealing for youngsters to be able to hear from someone who's 28, not 58' (Accounting Firm Employer H) and those younger practitioners would benefit by having the experience of standing up in a classroom or within the online environment and being asked a lot of questions about their experiences. Such a 'sharing of real life experience by practitioners as to what really happens [is something that should] happen on a regular basis to give perspective' (Other Employer A). Over the course of a degree, undergraduates could:

> … [be] exposed one hour a week to a hundred different practitioners. And that richness in the tapestry that those practitioners will provide' would encompass a wide perspective of careers in the profession and 'wisdom that undergraduates would otherwise not get exposed to (Other Employer A).

Other areas with which practitioners could assist would be in designing work integrated learning degrees that are embedded within the curriculum. Internships were also mentioned; however, work placements posed a constraint on practitioners as one noted:

> From our point of view having people on a work placement is a bit of a pain ... because it's a bit like a graduate, we don't get any value out of them (Accounting Firm Employer D).

Another suggestion by two of the interviewees was 'tapping the alumni' (Other Employer A; also Regulator B) and one interviewee thought that some universities were not very good at maintaining relationships with alumni, who often had a lot of goodwill towards their alma mater. Finally, the professional bodies and practitioners could provide 'materials or cases or practices' (Academic F) as resources that educators could use in the classroom or online with students to

bring professional practice to life and help students understand the expectations of the profession when they left university.

Students

The interviewees also noted that graduates who go to work in the profession and business often need to meet the requirements of their employers and their professional bodies. The profession requires people who are flexible, self-starters, who are reliable and responsible, and are sceptical. However, as one interviewee noted 'it is often down to the individual and their maturity and personality as it is to the education that they've had' (Accounting Firm Employer F). Indeed, some practitioners preferred to employ older people as one noted:

> [The] more mature age graduates who've done other things and, you know, they're just ready, they seriously are. So, I think it's about a maturity and worldliness and an exposure to lots of things (Regulator D).

Another also stated that he preferred older graduates:

> Young ones – I'll be honest. I tend to avoid the green ones … They're not work-ready and university can't do it for them. They have to do it for themselves (Accounting Firm Employer G).

The notion that students needed to "do it for themselves" was mentioned repeatedly by the interviewees. Examples of extra curricula activities included part-time jobs that would help the younger generation become more work ready and community activities that showed that 'you can think outside yourself – and there's a lot of generation-Ys that can't' (Accounting Firm Employer H). Another noted:

> … if there's someone with a 90 average I don't necessarily say well we've got to give that person a job. I'd rather see someone that had played some sport or been on a committee or done a bit of charity work (Accounting Firm Employer J).

Graduates who had worked were often at an advantage.

> If they've done anything that's customer facing, we view that very highly. We would see someone that's worked at Myer or David Jones as probably being higher on the valuable experience for us in terms of dealing with the clients (Accounting Firm Employer K).

This sentiment was repeated by other interviewees who were concerned about communication and client service, and:

> The only way you get it is working at a shop selling shoes or on the committee of your local footy club or captain of your tennis team or something like that (Accounting Firm Employer J).

When students are recruited into the profession they also needed to be able to ask open questions and:

> Talk in the language of the company that they're dealing with. Some struggle with that and a lot ask a lot of closed questions and then don't understand why they don't get the information that they need (Regulator C).

Finally, graduates were not coming into the profession and being able to 'write business related documents or emails' (Accounting Firm Employer E). Thus, curricula needed to be addressed to ensure that, within their tertiary education, students learned some of the professional values, ethics and attitudes (backed by professional knowledge and professional skills) that were considered essential in 2024.

Curriculum

Designing curricula to embed the professional values, ethics and attitudes needed in the workplace is difficult, according to one interviewee, because of the 'sheer numbers [of students]' (Other Employer B). Often the curriculum and degree have to meet certain criteria set by university management and academics and professional staff are just 'looking just for things to tick off, they're not really focused on what's the end game' (Academic F). The students are not taught 'in a way that requires them to have complete mastery of a great deal of things and be work ready at the end' (Academic E), which causes a gap between what employers want and the graduates that universities are producing. One step to alleviating this problem would be for practitioners to have input 'into the curriculum and actually setting the tone of what they're learning' (Accounting Firm Employer F).

It was noted by one participant that some of the theoretical and technical content of courses or units at university was at too high a level and would not usually be encountered by graduates for several years. It follows that by having students 'concentrating on all those higher level skills, they're not going to be work-ready' (Regulator G). Further, this interviewee believed that academics should use current material available online in their courses or units, such as the newsletters of the accounting firms, where a lot of current, up-to-date material could be found.

Some interviewees supported including professionals in course or unit delivery in the curriculum. For example, one academic noted that 'even at first year, it is possible to have sessions on thought leadership and practice' (Academic E). One interviewee asked why students were not asked to identify in their second year which sector they wanted to go into, such as professional practice, a corporate or the public sector, and then in third year students could take specialist courses that catered to that sector (Accounting Firm Employer C). Another commented that students have their mid-year breaks at university and that was the opportunity for universities to introduce specialist professional courses for a few days each break to gradually build up students' knowledge of the profession, aligning their expectations with reality (Regulator G). Alternatively, recently retired practitioners could come into the classroom half a day a week or enter the online learning environment and build up the professional knowledge base of students, although there would need 'to be reasonable quality control or otherwise, if the students are thinking, "Well, what a waste of time that is", so there would need to be some structure to it' (Accounting Firm Employer H).

However, the curriculum should be flexible enough that it addressed the needs of different types of learners and their different circumstances. For example, 'online works for some people, face-to-face works for some people, a hybrid of the two also works for some people' (Other Employer A). The interviewee continued that reflecting on learning was really important, and that universities should incorporate more activities that favoured the 'doer learner' rather than the 'learner doer' (Other Employer A). In other words, a form of situated learning should occur whereby students tried things and then reflected and learnt from their doing. Not only should the focus include both a 'learning and doing' orientation but also a 'doing and learning' orientation recognising that people learn differently. One interviewee discussed how some people are 'auditory learners' (from hearing) and others are 'visual learners' (from seeing) (Regulator H) and believed that the curriculum should incorporate both traditional methods of teaching as well as auditory and visual methods of helping students to learn.

Accounting as social practice and impact

The social aspects of accounting, particularly its impact on society, were explored with the interviewees. Social responsibility is explicitly incorporated into the IES, and this was reflected in the interviewees' responses. Responses fell into three main groups: a broader interpretation related to sustainability, social and humanitarian aspects, and the 'public interest' requirement as it relates to the functions of accountancy.

An understanding of society and its workings was considered a positive attribute that would allow accountants to see 'the purpose behind what they're doing' (Other Employer G). While professional knowledge is essential, accountants in the future must be able to 'connect the dots' (Other Employer F). Incorporating social policy issues into the curriculum would be useful in this regard, where such an understanding often comes with maturity and experience (Regulator B). Sustainability is such a social (and environmental) policy (Other Employer F, Other Employer D, Other Employer C).

Ethics and integrity were a part of this social practice according to another interviewee. This interviewee referred to a documentary on biometric devices by way of explanation, and noted:

> As time goes on the accounting profession is going to be called upon more and more to manage and to monitor the ethics of any forms of analysis … what does that mean regarding the role [that as a] financial professional do we play, and particularly the tagging of financial to non-financial analysis? How do we create that bridge and then what role do we play in being a sort of custodian for the non-financial information? (Other Employer A).

Ethics and sustainability are not portrayed as mutually exclusive concepts and there is a recognition that there are 'huge ethical and social responsibilities' associated with being an accounting professional (Accounting Firm Employer G). However, as with Regulator B, another interviewee felt that they 'would be surprised if a graduate at the level that they're at would see it' (Accounting Firm Employer E). However, scope for improvement is possible in accounting education, drawing in of 'the social and the political and the regulatory ... influences' (Academic E) and anchoring teaching to the conceptual framework.

Ways forward

During the interviews, several strategies were put forward by the participants to aid in the inculcation of professional values, ethics and attitudes for accounting students. Some reflect those suggested for the development of professional knowledge and professional skills, reinforcing the value of such strategies for accounting education. The suggested ways forward are:

- greater involvement of representatives of organisations and firms as well as members who are alumni in the classroom and online;
- greater focus in curricula on social, environmental and ethical dimensions of the accountant's role;
- students need to be aware of aspects of basic professionalism including communication styles, dress and demeanour, punctuality and appropriate social morays;
- students to be interested in the profession and understand why they propose to enter professional practice in accounting or, if not, to be able to articulate the purpose of undertaking such degrees;
- expose students to the "real world" of accounting, professional services and auditing through involving them in current issues drawn from daily media to promote contextualised understanding;

- using case studies that socially, politically and institutionally contextualise accounting;
- formal mentoring opportunities for students involving practitioners and academics; and
- streaming of students within degrees such as public practice versus corporate accounting or public sector roles.

Professional values, ethics and attitudes are inculcated through the study of accounting in its context. The focus is not on "doing" accounting but relates to the judgements and decisions that are necessary in the process of giving proper, ethical and relevant advice to support and enhance the objectives of clients and/or employers. It is recognised that this inculcation cannot happen in isolation but is an outcome of both initial and continuing professional development. Achieving a synergy between those engaged with inculcation – higher education providers, employers, the professional accounting bodies, and students themselves – is required.

Summary

This chapter shows that more progress is needed for accounting educators to prepare adequately their students with the professional values, ethics and attitudes requisite for working life and a career in the profession and business. Interviewees felt that educators need to start early in managing the expectations of students so that students are clear about what will be required of them after graduating, by embedding professional values, ethics and attitudes into courses or units early in to the degree and bring in practitioners to tell "war stories" and allow students to associate themselves with the profession. Higher education providers need to develop different approaches to learning so that students at least encounter learning styles that suit their own personality and learning preferences. For the students, work experience or voluntary work while undertaking higher education is essential to help students understand the world of work and the professional values, ethics and attitudes needed to be successful in a changing professional environment.

Chapter 8: Research

Introduction

A significant gap exists between accounting research and practice with claims of a lack of relevance of accounting research to accounting practitioners that does not lead to innovative practice or help problem solving within the profession. As far back as 1990, the Mathews Report noted that few accounting academics were engaged in conducting applied research and consulting projects (Mathews et al., 1990), and this remains the case today, reflecting a disconnect between accounting academe and professional accounting practice. In accounting, applied research is conceptualised with regard to the use of current knowledge (including theories and models) to find solutions to contemporary, real-world problems. Accounting is a vocational discipline that is relatively new to the university sector (when compared to arts, law and medicine, for example) (Demski, 2007; Evans et al., 2010). As previously highlighted, accounting schools carry some of the highest student to staff ratios in comparison to other disciplines with high teaching commitments, often at the expense of time allocated to research. An implication of this lack of engagement with the profession is the failure to consider practitioner needs, impacting on curriculum design and the failure to conduct research that is useful to practitioners (Inanga & Schneider, 2005).

The following section considers the role of research in accounting education through four sub-themes that evolved as part of the analysis of interviews: the usefulness of academic research to practitioners; the communication gap between academics and practitioners; university incentive structures as they relate to research; and, the relationship between research and teaching.

The usefulness of academic research to practice

Parker et al. (2011) note that accounting research should improve accounting practice, not simply describe, understand or critique it. However, collaboration between academics and practitioners for research endeavour is important but not a sole determinant of research, with the authors arguing that 'a crucial key role of academics remains: namely to critique, debate and challenge the status quo' (Parker et al., 2011, p. 8)[1]. Whilst academics engage with this role through their research, the communication of research results is often restricted to scholarly journals, rather than also engaging with professional practice and their publications.

Academic performance is measured by publication in top-tiered scholarly accounting journals that are read, some say, by only a small group of academics (relative to the total number of accounting academics) and not by practitioners. Academics may, therefore, be seen as elitist, speaking their own jargon that prohibits engagement from those outside of the academy (Baxter, 1988), with a view that practitioners are disinterested in debate or challenge of the status quo, let alone providing data to academics as a basis for empirical research (Bricker & Previts, 1990).

Practitioners' main criticisms of academic research are:

[1] Parker et al. (2011, p. 9) 'contend that accounting research needs to be socially, politically and institutionally contextualised, theoretically informed, and embracing interdisciplinarity. Without a persistent focus on social, political and organizational settings, our research will become lost in a myopic obsession with accounting technologies and practices so that our potentially wider societal contribution will fail to emerge.'

- it is too quantitative and based on economics, positivism and managerialism (Modell, 2014);
- it uses large datasets with an emphasis on generalisability (Merchant, 2012) that is not useful to practitioners who deal with specific situations at certain points in time and that are never average – although such averageness may be of use to policy makers (Singleton-Green, 2010);
- it ignores the skills of practitioners and their qualitative contexts;
- it requires academic boundaries that concentrate on single theories and narrow perspectives that are unrelated to the reality of practitioners (Merchant, 2012; Pearce & Huang, 2012); and
- it uses jargon that is incomprehensible, pretentious and elitist (Inanga & Schneider, 2005).

It is not uncommon for accounting standard setters to commission academics to complete important research, however, it remains unclear whether non-commissioned academic research has any influence on standard setting (Singleton-Green, 2010) or practitioner issues, despite a large extant literature on this (see, for example, Hail, Leuz & Wysocki, 2010; Agoglia, Doupnik & Tsakumis, 2011; Demerjian, 2011; Richardson & Eberlein, 2011). For non-academics, research methodology is often impenetrable and academic research too often contains little or no practical reasoning or application. Thus, Singleton-Green (2010) calls for academics who can translate the frequently unintelligible findings of research into a language that is accessible for the practitioner. Indeed, practitioners are key stakeholders in academic research and need information on what needs to be done at a given time and in a particular circumstance, rather than any generalised causes and consequences that may be of interest to policy makers. Too many accounting practitioners, it appears, tend to start from an assumption that accounting research is irrelevant to their work, and policy makers often make the same assumption (Carver & King, 1986; Howieson, 2003; Singleton-Green, 2010). Both may assume that research is too theoretical and remote from reality (Ratnatunga, 2012) in stark contrast to the relationship between academics and practitioners in the medical and health professions.

The gap between academe and professional practice is especially noticeable in financial accounting and auditing. Management accounting has less of a gap (Ratnatunga, 2012) with, for example, the development of the balanced scorecard as an accountability tool (Nørreklit, Nørreklit, Mitchell & Bjørnenak, 2012) including its adaptation to sustainability issues (Butler, Henderson & Raiborn, 2011), and the development of activity based costing (see, for example, Briers & Chua, 2001; Innes, Mitchell & Sinclair, 2000; Kaplan &Anderson, 2004).

The reality is that an overwhelming majority of scholarly journals has never been read by accounting practitioners – who have no interest in ever reading them (Ratnatunga, 2012). The core notion of ‘relevance lost’ (Merchant, 2012) and the research–practice gap, accepted by both sides, remains wide in the accounting and business disciplines (Evans et al., 2011; Pearce & Huang, 2012; Tucker & Parker, 2014). The competing tension between the two – academics’ focus on generalisability and statistical significance and practitioners’ needs for applications to specific settings – prevents the gap from closing (Merchant, 2012) and it may indeed widen in the future (Tucker & Parker, 2014). The language of academia and its scholarly writing conventions often means that practitioners cannot easily interpret and thus use the findings. However, not only is there a gap between academics and practitioners over usefulness; there is also a communication gap that is covered in the next section. Moreover, another gap is that the focus of much contemporary accounting research is positivist (that is, what we see in the world today), rather than normative (that is, how we can make things better).

In considering the research–practice gap, two themes related to stakeholders emerge: the self-interest and selfishness of different groups who ignore societal concerns; and the public interest. Singleton-Green (2010) notes that many parties have a vested interest in the formulation of accounting requirements (through education and research), but are 'uninterested in what research has to say about the matter unless it happens to support their own case' (p. 136). It may be that publicly quoting research that supports a view presents a risk as the research may be disproved in the future thus potentially undermining one's position in the public arena. Further, stakeholders' refusal to support research also disregards the public interest, reflecting their own self-interest (Singleton-Green, 2010). However, as academic researchers consume public resources they should also have a 'moral obligation to benefit society' (Merchant, 2012, p. 339) by making academic research more approachable to stakeholders.

Communication between academia and practice

Singleton-Green (2010) notes that the perceived lack of usefulness of academic research is as much about communicating the findings as it is about the way in which it is conducted. In an ideal world, academics should be rewarded for making their findings known to a wider public and for showing the relevance of their work to questions of public policy. This is certainly becoming the view in the UK with impact becoming a benchmark in government evaluations (Martin, 2011; Watermeyer, 2012). However, the perception of irrelevance will never be bridged if neither side thinks that it is worth bridging and if communication between the two is not encouraged (Singleton-Green, 2010). Academics who currently have little or no understanding of practitioners' problems, constraints and options (Merchant, 2012) need to connect with practitioners. Evidence-based practice in the workplace requires research to be made more accessible, understandable and relevant for practitioners who need to be more involved in contributing and co-producing research ideas (Burke & Rau, 2010). However, this communication gap may be symptomatic of the lack of communication by practitioners as evidenced by the gap between the preparers of financial statements and their users (Inanga & Schneider, 2005).

The lack of relevance and of communication between academics and practitioners is, in itself, symptomatic of the institutional context of academia and, in particular, the incentive structures associated with research.

Incentive structures for research

Research constitutes one of three areas of academic activity – the other two being teaching and administration/community service. Three sub-themes are important to this investigation: the pressure to publish in high quality scholarly journals ; writing only for other academics that is akin to a 'closed incestuous loop' (Pearce & Huang, 2012, p. 248); and academics being comfortable staying in their ivory towers and making life easy.

Research productivity in the discipline has been measured across various criteria. Hasselback, Reinstein and Schwan (2000) suggested that there are three types of benchmarks used to assess academics' performance:

- qualitative rank-ordering of accounting and related journals;
- quantitative measures of total and average research productivity; and
- quantitative measures of total and average research productivity according to where faculty earned their doctoral degrees.

The focus on objective research productivity (or output) is used to make performance evaluations for hiring, tenure and promotion. Accounting academics, like other academics, need to know the 'rules of the game' (Reinstein & Calderon, 2006). However, accounting is a vocational discipline with a strong professional orientation, and the relevance of research that is published in scholarly journals is potentially at the expense of research that may be of interest broadly to the accounting profession.

This focus on scholarly journals has intensified since the introduction of the ERA in Australia. ERA has encouraged transparency and the measurement of research achievements nationally and internationally provides evidence that published research is of high quality according to the measures used in such evaluations. However, despite these benefits, ERA concentrates on the quality and quantity of publications in academically determined high quality or elite journals and this has the potential to narrow even further the focus of accounting research. Indeed, de Lange et al. (2010, p. 25) point to the extent of 'concern, uncertainty and angst amongst academics and the sector' and continue that:

> … another concern raised by many interviewees is that a narrowing of research could stifle creativity and motivate researchers to opt for low-risk projects that are likely to be acceptable to mainstream researchers. Unorthodox or highly innovative research that explores problems of special interest to Australasia may be discouraged (p. 34).

The competition for publishing in the top or elite accounting journals is made more difficult in the accounting discipline than in other business related disciplines as Buchheit, Collins & Reitenga (2002) show that there are considerably fewer top-tier journals relative to the other three major business disciplines (finance, management and marketing); the number of faculty members in each discipline and the number of spaces in top-tier publications place accounting faculty members at a comparative disadvantage when comparing their research records with those of their colleagues.

Academics are rewarded for publishing in high-ranking scholarly journals and not for practitioner-professional journals. Editors of scholarly journals tend not to encourage authors to engage with practice-related issues often discouraging such submissions (Ratnatunga, 2012). The weakness of current incentives for accounting academics to make their research findings more widely known, hampers communication with practitioners and policy makers. Rather, the current incentives push researchers to publish in journals where the readers are predominantly other academics and the content tends to be narrowly focused on specialist areas or informed by particular methodologies, theoretical approaches or paradigms (Singleton-Green, 2010). On the other hand, Parker et al. (2011), while calling for research to be theoretically informed, also 'contend that accounting research needs to be socially, politically and institutionally contextualised' as well as 'embracing interdisciplinarity'.

The training of new scholars through PhD degrees discourages engagement with practitioners as supervisors are ensconced in their 'ivory towers' from which it is too uncomfortable to emerge (Ratnatunga, 2012). Practitioner-focused research does not attract any incentives and, thus, academics tend not to engage, despite calls to do so (Merchant, 2012). Practitioner-focused problems offer great potential for research, especially in terms of interventionist strategies (action research) and without this academics will not be in a position to understand what is relevant to practice (Pearce & Huang, 2012).The Australian Research Council's Linkage Grants do offer a potential avenue for more research partnerships between academics and practitioners but such grants have proven difficult to win.

The importance of research to the accounting discipline

In any academic discipline research is important and accounting is no exception. Nevertheless, in other vocational disciplines, such as medicine, a synergistic relationship exists between research and professional practice as well as with the education of future professionals (Inanga & Schneider, 2005). However, in accounting, this relationship is disjointed. Unlike the medical or health disciplines or law, accounting is unique in that academics may have a successful research career without understanding practice at all (Singleton-Green, 2010) whereby entry-level PhDs in accounting join academia with no institutional knowledge of accounting in practice. Without current discipline knowledge or experience, it is extremely difficult for these recruits to teach or research practitioner relevant topics.

The importance of research to accounting as an academic discipline is well demonstrated, yet its relevance to practice is questionable. This is sometimes caused by the reluctance of academics to become engaged with practice-focused problems, largely because of limited publishing opportunities and weak incentive structures.

Compounding the effects of this lack of current knowledge and professional experience are the textbooks that the discipline uses to educate accountants. These textbooks, with the exception of those in accounting theory, largely ignore research. Consequently, both faculty and students may not see research embedded firmly into discipline knowledge nor are they exposed to a research tradition, resulting in the commoditisation of accounting knowledge and education (Radder, 2010; Kauppinen, 2013). The result is a constant and relatively unchanging body of knowledge taught across all accounting degrees (Ratnatunga, 2012). Students are unable to understand academic arguments and related jargon, and as a result, the majority of courses or units taught become dry, boring and unpopular (Merchant, 2012). This may, at least in part, be influenced by the professional accreditation guidelines and the generally perceived stability of the basic technical knowledge all graduates need to possess. Textbooks and lecturers in basic accounting do not normally make reference to, or use, the contributions of academic research in educating accounting professionals, unlike other professional disciplines[2]. This highlights the battle to make accounting research relevant, interesting and understandable (Burke & Rau, 2010).

Interview findings

The research findings showed that there were three key issues relating to research: that of the value, relevance and importance of research to the profession and employers; the communication gap between academia and business; and the research–teaching nexus.

The value, relevance and importance of research to employers/profession

Regarding the value of research outside academia, some of the interviewees had very negative views on the research that is undertaken at universities. For example, one interviewee stated ‘No I’ve certainly never used it, followed it’ (Accounting Firm Employer J). Another claimed that ‘I

[2] Recent research published by the Grattan Institute (Norton, Sonnemann & Cherastidtham, 2013) concluded that there was little impact on the feedback and performance for the majority of students (based on high versus low research institutions), stating that there was ‘little reason to believe that teaching is improved by co-producing it with research’ (p. 38).

wouldn't go to an academic research paper for an analysis on something' (Accounting Firm Employer K) and finally one Other Employer stated that 'I avoid it whenever possible' (Other Employer E).

One participant explained why this might be the case.

> Publish or perish is one thing, but publish something that's useful. And it's not a navel-gazing exercise saying, "We've published 18 papers", that really, we can't cut our teeth on any of it … It needs to be more applied, solving a problem. People are more likely to listen … And you go, "Yeah. But we – Took us ages to it" [or] "Yeah. I know, but we're just not interested in it" (Accounting Firm Employer G).

On a more positive note, some interviewees made the point, that it 'depends [on] who it is for' (Other Employer E). One suggested that for staff in a consulting services team research was important but for a practice partner it was not (Accounting Firm Employer B). Research, therefore, might be focused in a way which 'may not be relevant for 99.99 per cent of the population' (Other Employer A). It was viewed that research was very internally focused on academia as the audience rather than the profession as noted by one participant.

> When you're in an organisation, you can become very internalised and I think research – I know that it is shared, it's published, but I still think it's very internalised… where do you define what you're researching? ... [There is] some benefit in perhaps getting some external perspective on what to focus on (Other Employer C).

Most academics were firm in their view that accounting research should be relevant and 'contribute back to the profession' (Academic A) for it to have value. Many referred to the importance of applied research particularly as it relates to practice.

> So we've had much stronger interactions with practice and I think that we're starting to demonstrate that our research actually does resonate and does matter but it requires a fair bit of building bridges to have that understood … We found even just the general superficial discussion of our research with practitioners didn't work, but having this much more intimate engagement has made a real difference I think (Academic E).

Some regulators were positive in terms of the value that they saw in relation to accounting research, with one referring to it as 'absolutely critical' and 'really useful independent, breathing, clear thinking space to be able to move us forward ... ' (Regulator D). However it was clear that the value lies in the relevance of the research to business and the profession. As one suggested, 'save for specific research areas that business might be involved in, business has no interest in academic research, that's the harsh reality' (Regulator H). However, participants did see the value of research but felt that the real value of universities is in their teaching. According to one participant 'standard setters are interested in the research that accountancy academics are doing because they're saying to progress financial reporting it's important to have evidence ...' (Regulator A).

Nevertheless, academic research provided impartiality and credibility to current issues and because of this added to the diversity of views around a topic. This was related to the fact that medical and scientific research was necessary and hence, in general, all research was useful (Accounting Firm Employer D). Academics brought independent thinking and thought leadership (Other Employer G) that research departments in firms and the profession could not. One interviewee summarised this stating:

> … accounting is dynamic, it's no longer just getting the numbers right. And just thinking about integrated reporting or sustainability reporting, there's a whole lot of emerging trends

> which ultimately that's the accountant, you never think yourself counting number of trees that you've killed through the lights you've got on, but the accountant is the best person to do that, and that's where the thought leadership and the research into those type of avenues. What's also important is the impartiality that the tertiary education can put onto it (Other Employer G).

However, the most common theme was that academic researchers should target what the profession wanted, and apply their research to solve problems and demonstrate what changes had occurred because of their research. This was aligned to communication covered in the next section, but most of the interviewees raised the need for applied research. One participant felt that there should be more linkage 'targeting what the profession requires rather than kind of the research that's for its own purpose' (Accounting Firm Employer C). One interviewee reflected:

> … [it]supports standard setting in terms of financial reporting. It supports regulation and the regulatory direction. It supports lobbying. I think it gives the profession credibility and it entitles the – I think it gives the profession more entitlement to self-regulate and set its own direction. I think it provides diversity to the sort of the community of accountants in terms of you've got people, you've got academics, you've got people in commerce, people in practice, people in regulation. That's an important part of just having a diverse pool of thinking. So again, I think - if we see accounting as a higher profession so to speak, or a higher calling then to be able to credibly say that you need to have an element of your community who is doing academic research (Accounting Firm Employer F).

The linkage to external stakeholders would bring impact and influence as one noted in the context of a global profession and global business.

> It can help with those particularly in a global sense. So academic research can help ... law makers and decision makers ... So if every country's just going off doing their own thing and there isn't that sort of sense of harmonisation then you can end up in all sorts of a pickle. You are not going to find someone in industry that's going to have the time, the money or even the aptitude to necessarily do that. So it's really vital that we do, and in fact, influence the government and government policies as well through that. The harmonisation of international accounting standards, that's got to be driven by somewhere, it's not necessarily going to be driven out of commerce. So that's where you'd look to academia to provide the grunt and the brains to be able to do it. So, I don't think you can say no it should only be aligned, I think you've also got to take a chance because you never know what an outcome is going to be that might align itself with future commerce. Research is valuable for its own sake. But I think if it can be applied then that's even more valuable. There is value in academic research its own sake because you never know what might come out of that. And the world would be a boring place if we didn't have new ideas being developed. But I think a lot more of it should be - or people would take more value out of a lot more of the research – if it had an applied value and had that linkage to industry (Other Employer D).

Indeed, research had to be contemporary and look to the future (Accounting Firm Employer C), and it needed to result in change (Other Employer C, Other Employer D), encapsulated in the comments by two participants.

> So what changes as a result of that, do we change standards, do we change … what do we change? But to be brutally commercial there's never been a market for what's been developed. I think there's an element of greater social good that it should be done. But I think the challenge is these days that altruistic view is becoming more and more challenged regarding being able to almost justify the why. How do you … change something, make something better? (Other Employer A).

> The value of research (is that) it can impact change (Regulator A).

Overall, there was support for the research conducted at universities, but it needed to be applied, relevant and linked to business and the profession and address current and future complex and challenging issues. While the value, relevance and importance of the research to the profession was highlighted, of equal value was the necessity to ensure that such research was communicated in an accessible manner to those other than fellow academics. Many respondents alluded to the problem of effective communication of accounting research.

Communication and dissemination by academics

Two themes in relation to communication by academics with external stakeholders was identified by interviewees: knowing audiences' needs through engagement by academics and) the lack of understanding as to how to promote and disseminate research in a manner that is accessible (and understood) by a business audience.

First, academics need to know who is the audiences for their research (Accounting Firm Employer B) – not just other academics – and get to know the needs of the industry (Accounting Firm Employer C), reducing the disconnect (Accounting Firm Employer I) through dialogue and engagement. As one participant noted 'there's no real direct engagement … I've been doing this for 23 years … I've been asked twice about research' (Accounting Firm Employer G). Another added:

> … partners and people within the business would definitely be interested in seeing that and having the opportunity to be involved and create dialogue in things being considered and that research I think would be of interest (Accounting Firm Employer E).

It was noted by one interviewee that:

> There are some things that the profession should probably look at and there are some things that academics might think we should look at that we probably haven't thought about maybe. I wouldn't like to think that I should be driving research because it would probably head in a particular direction so you need that diversity feeding in there (Accounting Firm Employer D).

Academics were critical of internal reward and promotion policies that promoted dissemination in highly-ranked journals, written in a manner that was not accessible by, or meaningful to, practitioners.

> There's a role for all sorts of research, but if we think we need to be having some impact on practice then we actually need to engage with practitioners and find things that we think we can realistically contribute to. But I think most of the time we're more interested just in meeting the metrics of some ranking institution (Academic F).

It seems that regulators agreed:

> So most academics I talk to, even the better researchers, say they're often guilty of not conveying their findings very well, not putting the context of their research very well and preaching to the choir. So that connection to business needs (Regulator B).

Clearly the participants see the value and importance of academic researchers but in general they lament the lack of accessibility to that research, primarily because it is published in scholarly journals that are not always comprehensible or accessible to practitioners in a meaningful format that can inform their practice. This is further evidenced by the discussion below.

The second point was about promoting and disseminating research findings in a format that business wanted so that there are tangible outcomes and actions (Accounting Firm Employer D); this was a notable criticism of the interviewees. Practitioners were less interested in the research

behind a finding; they just want to know the outcome (Accounting Firm Employer B). One interviewee was concerned that academics do not promote their findings to business and explain why it matters.

> I think I've received once, that sort of input [into research], and then when you give the input, you never know what goes on afterwards ... The people who will promote your research are the people that are engaged and you say, 'Here's a copy of the article and this is something you might want to use,' and I'll tell you how it really works. [Practitioners then] start to promote it, saying, 'I got interviewed by this professor and this is a finding I thought was interesting.' Yes. We're leading edge. You get other people to market the kudos when you get other people to talk about you [and your research] (Accounting Firm Employer G).

A similar perception is evident in the response from another participant.

> I think that's a difficulty, and ... I read some of the research articles and there's these very long equations and, you know, which are all well explained but ... in the end it's probably only one paragraph that really matters ... But sometimes that can turn people off from actually looking at the thing, maybe it comes down to communication what we were talking about before perhaps (Regulator E).

One thought that academics were generally poor at disseminating their work and at 'seeking feedback on what people want researched' (Other Employer C). Another interviewee had a very clear idea about how research and business communication in general should be written, and that reading the underlying research itself was not necessary.

> It comes to me embedded in a consumer friendly form which might be a brief article on a particular topic that's drawn on some academic research to make a point ... It needs to get into the hands of the person who can consumerise it. We live in a data rich world. We're all bombarded with so much information. And you have to make really deliberate, disciplined choices. And so I look for a particular style of information. So I'm not going to read a 30-page thorough telling of a topic unless my appetite is whetted and I find myself going there. I'm much more likely to go for the 30 second grab … the executive summary that makes all of the key points right up front such that if you wanted - if a whole series of key points you relate to and you understand intuitively that's fine. You read the style of document that leads to rapid absorption ... having dialogue boxes in the margin. Get to the point so the reader can make choices from the style of document, to read as much or as little as they need to get the point. Would I go back to the academic research upon which the article is based? Probably not (Other Employer E).

Another participant made a more novel point on seeing stronger relationships with business in that there was an 'opportunity here for academics to mentor guys within organisations, and vice versa' (Other Employer F), which would really embed the academic world in business, and enable business to understand the needs of academia. This relates to the third area of this chapter's findings, that of the teaching–research nexus in universities.

The teaching–research nexus

Academics, it seems, had different perceptions of what is meant by the teaching–research nexus. While the commonly held view of this term refers to the manner in which one's research can inform ones' teaching, this was not always evident in the responses provided. More generally, the teaching–research nexus may relate to the extent to which the research literature on any topic is used to inform the teaching of that topic. Some respondents were mindful of this.

> So for me the fit is really, really natural that I can bring research to the classroom. For me, you know, I can't talk for others and maybe it's not so easy to do for others, but for me it's really

> easy because it's my research area anyway so I do it and I know it and that's what I teach the students (Academic D).

Regulators too were aware of the notion of a teaching–research nexus and recognised the value.

> I think that the most valued academics are those who can teach well and who can bring an element of their research into the classroom. Now anyone can bring research into a classroom and it makes no sense to anyone. I'm talking about research that actually makes sense to kids (Regulator H).

However, others were more aligned to discussing the trade-off between teaching and research in an increasingly research-driven environment. The interviewees were generally supportive of both research and teaching being the domain of universities as research needs to inform teaching and the curriculum; this is what differentiates tertiary education from primary and secondary education, as one remarked:

> The thought leadership ... that then ripples down into the education. So I would hate to see that element of it falling away and overemphasising we're just purely a [secondary] school. I see a university very different to a school. I think the value comes in the education where you can almost teach the thought leadership side (Other Employer G).

Another thought that each were important as one led to the other in subtle ways.

> [If] you want to produce people who have a capacity for broad thinking and higher thinking than basic bookkeeping, then I think having access to the research capability and people who are experienced in the area to lead them and guide them and mentor them, I think, is absolutely part of why people go to a tertiary institution. So, to say one's more important than the other, I think is, a very big call (Accounting Firm Employer G).

Further, one interviewee noted that the teaching–research nexus and engagement with industry could create a lot of material, such as case studies, that could be incorporated into the curriculum.

> I think for me this comes down to how do we get case studies for real business and how do we leverage that already relationship that we've built, that the university's built with organisations to start to impact on real life. Tangible case studies. There's examples of where accounting has been technical, what's the value chain. So, you know, the textbook will teach you the technical piece but it won't teach you about the financial drivers of a business unit, it won't teach you about the strategic view and the direction. So how do you actually then start to overlay some of that? And for me there's a great opportunity there because that builds business acumen, commercial acumen, strategic thinking, communicating with influence – all those softer skills that technically you're not going to find in a textbook, and I think we need to start to develop more stronger and better aligned relationships between the universities and big organisations (Other Employer F).

Some of the interviewees dichotomised teaching and research into the time dimension by noting that teaching was about today and that research was about the future and that a connection was needed between the two, as one participant commented:

> Research for me goes into what's the longer term view of the accounting profession … Teaching is more here and now … that is going to have a direct impact on the students. If you're looking in the short to medium term you'd say teaching is more important (Other Employer F).

Another interview agreed that 'teaching is just doing what they have done before. If it's not based on research then it's not going anywhere, is it?' (Accounting Firm Employer H).

Some interviewees turned this around and thought about the benefits of students doing research and thought that students might come out as 'better advisors' (Accounting Firm Employer J). Another noted that:

> Every year you look at the course content and you make sure that it's relevant and on point. And incorporating some of those new research and learnings into that coursework would be a way of seeding that in. And also we do want … if you do want researchers in the future you've got to potentially get students to get involved where they can in research projects so that their interest is stimulated as well (Other Employer D).

Overall, the teaching–research nexus was seen as important and something that should continue to be supported by universities.

Ways forward

The participants in this investigation recognised and accepted the importance of scholarly research, however, they reflected, in general, their preference for alternative forms of communicating the results as well as increasing the relevance of the research to professional practice. Strategies suggested by interviewees focused on several areas including the need to strengthen connections between academe and profession and the use of research in accounting education. The following strategies were suggested:

- build better connections amongst academic staff with the profession;
- ask practitioners what research is desirable and relevant;
- academics to conduct more research that is relevant to the profession including the use of Australian Research Council's Linkage Grants to bring academics closer to the profession;
- use more applied research in the classroom and have students more involved in the research projects of academics;
- review and change incentives at universities to foster applied and relevant research; and
- place a greater emphasis on academics also communicating research findings to practitioners in appropriate forms.

The balanced accounting academic is one who is aware of the changing dynamics of professional practice and is able to contribute to scholarly publications and other outputs, providing a fusion of both the academic and practitioner perspectives. However, such balance has become increasingly uncommon among *full-time* accounting academics. The current requirement in many Australian higher education providers for entry-level staff in accounting departments/schools to be PhD qualified may, potentially, contribute to this imbalance as few individuals with strong and/or lengthy experience of professional practice are likely to possess or strive for a terminal degree. Without firmly-grounded discipline knowledge or experience of professional practice itself, there may be limited prospects for these recruits to be able to teach or research practitioner relevant topics effectively.

While the findings show that practitioners see a potentially important role for accounting research to lead the policy debate and to inform standard setters, amongst others, this study highlighted the perception of a gap between accounting research and practice. To the extent that this perception is true, the capacity of academic accounting research to lead to innovative practice or help problem solving within the profession may be limited. The increased casualisation of accounting education and teaching-intensive contract positions is perceived generally as a contributing factor as educators focus on teaching rather than teaching *and* research. One possible implication of this lack of engagement with the profession is the failure to develop a teaching–research nexus that

considers practitioner needs impacting on curriculum design and the failure to conduct research that assists practitioners.

Summary

This chapter has addressed three key issues related to research: that of the value, relevance and importance of research to the profession and employers; the communication gap between academia and business; and the teaching–research nexus.

Overall, research that is applied and targeted to the specific needs of a key stakeholder group is valued. This contrasts with the growing focus by many business schools on research published in top-tiered journals that is often theoretically focused rather than applied. This disjunction inhibits academics who seek promotion and who are motivated by the expectations or requirements of universities (high-ranked journal publications) rather than the needs of other key stakeholders (applied research that makes a difference to practice). This is a university policy issue and reflects a one-size-fits-all approach to disparate disciplines within the university.

Clearly the communication gap between academia and employers relates to the item above. Where reward structures are aligned to journals that are primarily read by a small number of academics (in the total scheme), and heavily based on theory and theoretically derived models, with its own language, it is inevitable that academic research will remain inaccessible to practitioners. This again, is an issue that is determined by a promotions system that is enshrined in university policy and one that business schools have, to date, had difficulty in lobbying for change.

Finally, while there is variation in how respondents interpreted the teaching–research nexus, it was generally viewed as a process where research informs the content of the course or unit design and that this distinguished, in a positive way, the education provided at the university level. This contrasts with secondary level education or other providers, where research is not expected nor required.

Chapter 9: Technology

Introduction

Digital technologies are disrupting the design and delivery of accounting education in higher education around the globe (Johnson & Brown, 2012). They also are impacting the nature of work for accountants, like in many other professions. While much has been written on the subject (Ai-Lim Lee, Wong & Fung, 2010; Chen, Jones & Moreland, 2010; Perera & Richardson, 2010), empirical evidence to support improved student learning outcomes using current and evolving technologies is scarce (Kember, McNaught, Chong, Lam & Cheng, 2010; Tamim, Bernard, Borokhovski, Abrami & Schmid, 2011).

Technologies have changed the way that students, academics and employers operate, interact and learn – internet, email, Facebook, Wikipedia – all are part of an individual's unique personal learning environment. Each one is individual but technologies allow for the tailoring of the technological environment to individual learning needs – as it does for students. These technologies can be used for collaborative and blended learning, assessment and feedback, delivery of degrees across multiple campuses in order to meet efficiency goals, personalised learning and to improve the learning experience across diverse student cohorts.

Despite the potential for these technologies to enhance learning experiences:

> One-third of the Australian economy faces imminent and substantial disruption by digital technologies and business models…what we call a 'short-fuse, big bang scenario'. This presents significant threats, as well as opportunities, for both business and government (Deloitte, 2012, p. 1).

Within Australian higher education, an apparent skills gap between those at the receiving end of the curriculum and those who are of an older generation at the delivery end may be a determinant of the gap between students and academics in embracing digital technologies. Interviewees were certainly mindful of the ubiquitous nature of technology in terms of its impact on accounting education curriculum design, the increasingly global workplace and the graduate attributes sought after by employers.

As previously discussed in Chapter 5, the role of the accountant in a globally competitive, technology-driven environment requires new skills and knowledge. Educators in a vocational discipline need to be mindful of this as it impacts the type of graduate that employers seek and, as a consequence, the need for changes in curriculum design and delivery. In this study, interviewees were asked about their views in relation to how technology affects accounting, the role of the accounting professional and the manner in which accountants are educated for the future. Across the four stakeholder groups interviewed, there were no discernible differences in their views of technology and how it has impacted the role of the accountant and accounting education.

The following section discusses the key themes that emerged from the interviews and the potential of these themes to influence the future of accounting education. The emerging themes identified and discussed are as follows: the changing workplace; emerging skills requirements (virtual communications and teamwork, critical thinking, adaptive and analytical skills); embedding digital technologies in curriculum design; and developing the capacity of academics to deliver in the new learning technologies environment.

The changing workplace

The accounting profession is not immune from the role that technology is playing on changing work patterns and responsibilities[1]. As one of the interviewees stated: '... we eat change for breakfast' and:

> …the only practices that are going to be in business in the next ten years are the ones that are fully IT adept. Every job that you get will probably disappear in six months (Accounting Firm Employer G).

Increasingly accountants are being seen as key team players in strategy design, implementation and performance measurement and reporting. Compliance work is declining and transactional activities are increasingly being automated and/or moving to offshore locations, as alluded to by employers and regulators in this study and expressed by two interviewees as follows (see also Chapter 5).

> Well we do know that some of the big accounting houses for example are getting a lot of their basic grunt work done overseas. The back office is going to places where labour is cheaper (Other Employer B).

> There's also the offshoring and the implication of that on the demographic of an accounting workforce. I'm not sure where that's all headed but it's pretty dramatic (Other Employer E).

Discussing the practical implications of this trend for accountants, one interviewee stated, 'the more routine skills are getting replaced ... I think that soon we won't need a lot of bookkeepers. Transactions are increasingly automatically captured and processed' (Regulator A).

This change means that many of the accountants of the future, who are our current accounting students, will require a new set of skills that are less operational and more strategic in nature, a finding that is supported in prior research (Kavanagh & Drennan, 2008). Chapter 6 discussed the skills of the future and here the skills identified in relation to emerging technologies are specifically considered.

As described by the interviewees, technology has changed the landscape in terms of graduate skills. Respondents spoke about the need for accountants who are comfortable with the use of technology and mindful of its potential.

> Technology is *huge* for us ... we are actively looking for people who are comfortable with technology and willing to think about things differently, to think about how technology might work (Other Employer H).

They also stressed the responsibility of universities to nurture these skills and create graduates who are ready for the 21st century workplace. 'Universities have a key part in ... terms of the supply of accountants with the right skills and everything else' (Regulator E).

[1] International Education Practice Statement 2: Information Technology (IFAC, 2014) identifies the need for accounting professionals to be competent in one or more IT roles (manager, evaluator or designer). This is reflected in the most recently reissued accreditation guidelines of CPA Australia and Chartered Accountants Australia and New Zealand in the requirement to consider IT through a whole-of-program approach, see http://www.cpaaustralia.com.au/cpa-program/professional-accreditation-guidelines.

Emerging skills

Technology demands the addition of new skills sets for accountants, while not ignoring those that underpin the work of the professional accountant. These new skills sets are necessary in a changing workplace and educators must be mindful of them in curriculum design. Interviewees identified a number of these new skills, and also reiterated the critical nature of the more familiar, professional skills that take on new meaning in a technology driven world.

In terms of the new skills set, the increasing need for accountants to work in a virtual global environment was elucidated by a number of the interviewees. One raised the question: 'how do you actually start to collaborate through building relationships through technology? (Other Employer A).

Others raised similar concerns about technology and interpersonal relationships, suggesting that 'there's an over-utilisation of technology that's going to stop people interacting with people. That really frightens me' (Other Employer C). Despite this, frequent reference was made to the value of being able to communicate and work as a team across virtual environments.

> Intimacy can be achieved as effectively over a computer as it can be face-to-face ... for the next generation coming through; it is a completely relevant way of looking at engagement... (Other Employer A).

Company intranets and social media were seen as increasingly important in effective communication in the modern day workplace and some accounting employers saw this as being driven by the younger generation.

> We're actually even moving away from the email technology ... that certainly was the new and fresh thing when I started. So certainly as a business we tend to encourage the use of our intranet social media sites, all these sorts of things to connect ... And actually it's our student population that have really got more familiar with that and is helping the rest of the firm come through ... And I'm not sure that's something that you necessarily need to teach, it's something that just is changing in the way that we work on an everyday basis (Accounting Firm Employer B).

The same interviewee spoke about this as integration between the personal and professional and about the new skills required to bridge this gap. This respondent saw those with the mindset to view the important place that social media occupies within business as 'powerful' (Accounting Firm Employer B).

These emerging skills in graduates take on increasing importance when considering the fact that the ageing workforce does not always have those skills. Another interviewee explained:

> ... we've all got notes on our phones and our iPads and whatever and yet we still write. Maybe it's because we're older and, you know, and we're not there yet ... My typing skills are still two fingers ... Reasonably quick but two fingers (Accounting Firm Employer D).

Not only is the new generation of accountants entering the workplace doing things differently on account of technology, but workplaces and spaces themselves are changing according to another interviewee.

> If I fast-forward 20 years ... I think in the future the whole concept of an office is going to become a virtual proposition ... people are going to look back and look at how we use offices today as just such an inefficient way of doing things (Other Employer A).

With these mounting changes, some saw it as critical that graduates be comfortable with, and adaptive to, change. One of the interviewees commented:

> ... the most important thing is that graduates are coming to a business with the ability to adapt and learn quickly and be able to adapt to change quickly and pick up things in a way that they can then move forward with them from a business delivery point of view. So it's probably more about that flexibility and adaptability than it is I think around a particular system. You know, systems in which the business is using to operate and offer to clients is changing so rapidly so, you know, what you learn today could be outdated tomorrow. So ... being able to adapt is probably the key (Accounting Firm Employer E).

Also commenting on fast-paced change, another spoke about the importance of graduates having the skills to identify and manage the risks that now arise in the technological era of accounting.

> [The] rapid evolution of technology just creates a consistent stream of new issues and risks that accountants need to be aware of and deal with ... I mean they need to be on top of and ahead of that game to, as I said, anticipate the risk that that will represent so that they can deliver in their role (Accounting Firm Employer F).

However, it is of note that those skills more usually associated with the work of the accountant remain important. In particular, respondents made mention of the importance of their staff being able to analyse critically and interpret the data derived from new systems using the latest technology.

> You need ... high quality people to be able to interpret the information that comes out of this technology (Accounting Firm Employer I).

> Now the young guys and girls are getting the data on a MYOB file or they're logging into Xero on the internet and looking at what has already been processed. So you probably need maybe some of those audit type skills to actually look beyond what you're seeing to see if it is reasonable ... So you need some analytical skills I think (Accounting Firm Employer D).

> You need young people who are comfortable with the technology but also prepared and able to look through the technology ... So look inside the black box ... (Other Employer E).

> So we have all these great interrogation and analysis tools ... even though they have accounting experience they don't know what to do and how to assess the information (Regulator C).

> There is endless data that you can produce ... It is about interpreting and understanding what does it mean and how can it be used, is it meaningful or is it just rubbish, is it data or real information? (Regulator D).

These comments point to the need for graduates to be more than just comfortable with, and adept at, technology; they also need to be able to assess information and interpret it critically, look through the technology and, ultimately, make meaning from the volume of information accessible and communicated.

Curriculum design and digital technologies

Technology is potentially a 'game-changer' in curriculum design and delivery in accounting education (Watty, McKay & Ngo, 2014). Digital technologies in higher education have steadily increased over the last 20 years and it is reported that this upward trend is likely to continue (Norton, Sonnemann & McGannon, 2013; Johnson et al., 2014). In fact, a recent Ernst & Young (2012) report found that, since 2009 'the pace and disruptiveness of change has really accelerated' (p. 9), impacting how education is delivered and designed.

Learning is increasingly understood as experiential, socially constructed and interdisciplinary. It cannot be assumed that learning is confined to a classroom or lecture theatre or that transmission

of knowledge is the role of accounting academics in business education. In this environment it should be noted that increasingly, learning occurs through enquiry, participation, critique and social connection and contributions. The landscape is changing and fast. Broad (2012, p. 11) wrote, 'We are justifiably proud of our unique and diverse system of higher education. We must also have the humility to know that it can be even better'.

The course, unit or subject is not the most significant learning place for many students who are always connected, communicating and clicking. This generation of learners has been referred to as Generation C or digital natives (Friedrich, Peterson, Koster & Blum, 2010) who are, unlike previous generations, living in a world where everything is online. Changing pedagogical models to suit the unique learning needs of 21st century learners remains a challenge (Johnson et al., 2014). In addition, universities need to be more accountable and transparent in how they spend the increasingly diminishing public dollar in overall institutional funding.

Assessment using pen and paper rarely measures what students really know. It usually measures what they have learnt to be able to pass a test. Technologies help to reimagine how students might be assessed for the knowledge skills and competencies of the next decade and beyond. One respondent explained the out-workings of this:

> ... the technology now has to be built into the learning program because it is a tool that accountants need to be aware of and need to know how to use appropriately (Regulator C).

The current and future cohorts of students entering courses or units are technology literate. Some may be more so than others but the reality is that technology is a part of their everyday lives. Friedrich et al. (2010, p. 1) suggest:

> As they grow up, this highly connected generation will live 'online' most of their waking hours, comfortably participate in social networks with several hundred or more contacts, generate and consume vast amounts of formerly private information, and carry with them a sophisticated 'personal cloud' that identifies them in the converged online and offline worlds.

Technology further provides the opportunity for engaging diverse student cohorts in their learning, as articulated by Academic A, '[We] spend a lot of our time thinking about how to engage students and how to get them active and participating, active learning and so forth'.

Further, software accounting packages abound and the ability to engage with the technology that supports them is often easier for students than perhaps the academics (or employers for that matter), as one interviewee reflects:

> ... you don't need to sit down with an instruction manual like we did back in the old days ... I don't see as much need for structured formal classes teaching students how to use technology (Academic B).

The same academic also stated '... [students] just need a brief introduction and they will land it themselves and that's probably a better way for them to learn' (Academic B).

Practitioner interviewees, not surprisingly, were not able to comment specifically on the area of university curriculum design and digital technologies. However, they were generally of the view that accounting graduates need the capacity to adapt quickly to emerging technologies.

> Technology is huge for us. And we are actively looking for people who are comfortable with technology and willing to think about things differently, to think about how technology might work. I think that we will start to be much more active in looking for people that have those skills but also have an interest in technology and what it can do. So for universities in terms of, I guess, in building work with the graduates, I think that they will have to start thinking

> about how they build technology into all their courses as opposed to just computer science, engineering and those types of courses and how they get students to have a basic understanding of how technology works regardless of what discipline they're coming from (Other Employer H).
>
> Technology is changing so quickly that regardless of what it looks like the most important thing is that graduates are coming to a business with the ability to adapt and learn quickly and be able to adapt to change quickly and pick up things in a way that they can then move forward with them from a business delivery point of view. So it's more about that flexibility and adaptability (Accounting Firm Employer E).

A small proportion of the practitioner interviewees also mentioned the need for specific IT skills such as creating and/or using advanced spreadsheets and exposure to Xero software, built into courses or units. Familiarity with big data and its potential was also mentioned by some interviewees.

Emerging skills development for academics

Albrecht and Sack (2000) suggested 15 years ago (at the time of writing) that technology would radically change accounting education and warned that, even back then, many accounting educators did not understand the potential of this impact. More recently, Senik and Broad (2011) refer to a lack of interest from academic staff accompanied by a lack of knowledge of the technologies available. Further, they suggest that a lack of time and competence contribute to the slow take-up within higher education.

Schneckenberg (2009) suggested that a major impediment to the advancement of learning technologies is a lack of interest from academics. More recently, a study by Watty et al. (2014) of Australian accounting academics considered as champions in the implementation of learning technologies to improve student learning revealed that a key impediment was time and access to academic development opportunities in the area. When asked the major impediment to engaging with technology to enhance student learning outcomes in accounting education, the major theme to emerge from accounting academics was a lack of time, given other areas of responsibilities and an increasing focus on the need to publish in highly-ranked journals and to earn competitive research grant income. Further there was evidence of the need for just-in-time academic support rather than the existing more formalised, one-size-fits-all central approach.

Technology does not define what people do. It is people who define how technologies are deployed, not the technologies themselves. For real change in the business curriculum – and (fast or faster?) change is needed – technology can play a key role in reimagining how business education can be re-modelled to deliver 21st century education that enhances the learning outcomes for all students, including assessment and the incorporation of social media into course or unit delivery (Cameron & Dickfos, 2013; Richardson, Dellaportas, Perera & Richardson, 2013).

Graduates will be immersed in a technology rich business environment. Students are being graduated for work in a new digital world. They must experience this world and the way that it can shape their learning and understandings. Schneckenberg (2009, p. 413) provides a useful commentary on the important role academics play:

> Academic staff play a key role in the underdeveloped state of eLearning in higher education ... Academic staff are nowadays facing new pedagogical challenges; they have to design learning environments which respond to the changing needs of technology-savvy students; and they have to integrate ICT into their courses to extend the flexibility of educational services in universities. But does faculty have the competences to respond to these challenges?

The academic respondents reflected a similar view, such as the following two interviewees:

> Higher education does a very poor job of providing continuing development for faculty and faculty fail to adapt to what's going on in the world and they have an obligation to be current with respect to how they teach (Academic C).

> You've just got to find it [technology] and get links and marry it with your courses, don't try and reinvent everything. There's stuff out there that's done better than you ever do it, and in a lot of cases it's free (Academic A).

Practitioner interviewees, not surprisingly, were not able to comment specifically on the area of emerging skills development for academics. However, they were certainly of the view, as previously noted, that accounting academics and degrees need to be up-to-date in all areas including technology and digital literacy and that their graduates need to be equipped with the tools to adapt to the evolving technological landscape.

Ways forward

Technology is seen to be changing the way students learn, academics teach and the accounting profession itself operates. The findings indicate that technological advancement has had a profound impact on accounting as a profession and the workplace overall. The new generation of students coming through is the so-called "net generation" – for whom technology is entrenched in everyday life. There is, however, a risk in making assumptions that students have a deep understanding of technology, even if its use is commonplace.

All participant groups alluded to the practical implications and impact of technology. These included an overall environment of continuous change, increasing automation of tasks and offshoring involving, most typically, the operation of low-cost and intensive, technologically-driven work zones (or places). The findings suggest that contemporary graduates need to be adequately skilled to manage working in these new and shifting parameters, and increasingly this will require those who are strategic rather than operational.

Graduates will also be required to be comfortable with, and competent in, the adaptive use of technology and be ready for the 21st century workplace that awaits them. The new workplace requires that graduates can work collaboratively across virtual environments, where members of teams may be spread across locations or more likely, countries. This has obvious implications for communication and collaboration and graduates will need to know how to communicate with people across virtual environments and offshore. Dealing with or managing team members in virtual environments demands a whole new level of skill beyond just aptitude with technology.

Respondents insisted that, as well as developing skills and aptitude in IT, there needs to be a constant focus on the skills of critical thinking, problem solving, judgement and the ability to interpret, regardless of how data is accessed and aggregated as information. These skills have become even more essential. The ways forward suggested include the following.

- Technology and IT skills will necessarily be embedded across accounting degrees and cannot be additional extras.
- Higher education providers must engage with technology-enhanced learning.
- Academic staff will need to be comfortable, motivated and proficient in the use of technology.
- Academics need to remain abreast of technological developments to ensure delivery of the new skills required of graduates in the evolving 21st century.

Interestingly, despite the frequent references to transformative change, no respondent raised the issue of innovation in relation to the potential for transforming student learning as a result of applying emerging technologies in curricula design and delivery, or the need to stay abreast of those emerging technologies. It is virtually impossible to know with certainty the reasons for this finding. While it may be that this type of innovative progress is assumed, and therefore, was taken for granted by the participants, it may also mean that many of the respondents are unaware of the potentially transformative nature of technology in terms of innovative approaches to student learning in the 21st century.

Summary

Supporting the extant research and prior studies the findings point to the ubiquity of technology in education and the business world. Academics, employers and regulators alike viewed technology as an essential aspect of everyday working life and a skill that accounting graduates, accounting academics and employers will need to embrace and indeed possess.

Accounting graduates in the 21st century will need to be adept at not only using technology, but equipped to deal with all of the challenges and opportunities that arise in a technology-rich business world; for example, managing virtual teams, interpreting and critiquing large volumes of data and making decisions and judgements around this data. The importance of these so-called 21st century skills cannot be overstated.

Paralleling these skills is building the capacity of academics to ensure they are equipped to teach these required competencies. Prior research indicates that this is not an easy task, with many accounting academics perceived to be resistant to change and slow to adopt technology in their teaching practice. The appropriate support, including training, must be provided to staff to ensure they are able to deliver, across all course or unit offerings on an integrated basis, the technological nous and skills required of accounting graduates in the modern day.

Redesigned accounting courses or units that embrace the potential of learning technologies will challenge the existing perceptions and digital competencies of many accounting academics. The approach must be whole-of-degree because it is no longer enough to have an individual champion designing innovative stand-alone subjects. Accounting education stakeholders expect more and its students deserve more. So what might this innovative accounting degree look like? And how might it differ from the existing degrees on offer?

The potential of technology to deliver personalised learning tailored to the diverse needs of cohorts is key. Diagnostics at key touch-points of a degree that guide students to resources suited to their individual learning styles and needs may be one approach. Assessment that embraces an e-portfolio approach to evidencing learning and career thinking, that encourages students to evidence their own learning within and outside the university curricula, particularly of professional (professional/employability) has been widely applied in engineering, teaching and nursing, but less so in accounting[2].

Work as it is currently known is changing through the widespread adoption of key enabling technologies. Accounting in the future will require different skills. The challenge for higher education providers, accounting schools and academics is to bring a willingness to recognise that

[2] see, www.buseport.com.au

technology has changed, and is changing, the way that people work and learn in their everyday lives, and university education must define and reflect this new reality to remain relevant.

Chapter 10: Recommendations

Introduction

The purpose of this chapter is to address the third aim of this study, namely, to develop feasible, innovative and productive ways forward to meet the many challenges faced by accounting higher education and to take advantage of the opportunities identified. The investigation's 17 recommendations are far-reaching and aspirational[1]. These recommendations are framed across two key areas: curriculum relevance and development; and connections between accounting academe and professional practice, professional bodies and business. A final recommendation relates to engaging all stakeholders in a genuine commitment to reforming accounting education in Australia. Within each of these two main sections, specific recommendations are made for each of the four stakeholder groups associated with this investigation: higher education providers and accounting schools; employers; professional accounting bodies; and accounting students. In this chapter, reference to accounting schools concerns the operations of those schools in the context of business faculties, with a number of the recommendations also relating to other discipline schools that teach accredited and other courses within specific accounting degrees and the broader academic community through academic accounting associations such as AFAANZ. The recommendations are accompanied by a number of action points. The list is not exhaustive and is not intended as binding but merely represents possible ways to achieve the recommendations.

Curriculum relevance and development

The primary task confronting academics and other stakeholders in accounting higher education is at least maintaining, and preferably enhancing, the relevance of the curriculum and ensuring its content and delivery serve the needs of business in changing times.

Based on the findings of this study, together with the insights provided by prior research, the following recommendations are proposed in an endeavour to enhance the relevance of the curriculum.

Higher education providers and accounting schools (Recommendations 1 to 5)

Recommendation 1: Create and expand learning strategies and assessments that develop students' professional skills and explicitly ensure that such skills are embraced, and assessed in accounting curricula

The following action points are suggested to facilitate this recommendation.

1.1 Accounting schools to require the assessment of professional skills in all courses or units of a degree with a minimum 30 per cent of the final grade for each course or unit to be specifically associated with the development of these skills.

1.2 Accounting schools to ensure that to all students that outline the progressive development of professional skills across a degree as part of regular orientation activities.

[1] They are many and varied and may not represent the views of all authors to this work. That should not be unexpected, given the importance and complexity of the issues under discussion here.

1.3 Accounting schools to ensure that, across a degree, academics integrate a variety of assessable tasks, including case studies, oral presentations, formal debates and role plays, to allow students to practice and obtain feedback on professional skills development.

1.4 Employ the services of communications and online educational designers across degrees on an ongoing basis to work closely with academics to extend the modes, and enhance the quality of, communication in teaching.

1.5 Explore and adopt smart technologies that allow for synchronous and asynchronous delivery, assessment and feedback.

1.6 Employ instructional designers and communication skills staff to work collaboratively across courses and degrees to enhance students' written and oral communication skills as part of professional skills development.

Recommendation 2: Incorporate into academic workloads sufficient and appropriate recognition of time and attention associated with developing and/or assessing professional skills and to openly recognise and reward (extrinsic and intrinsic) teaching excellence

The following action points are suggested to facilitate this recommendation.

2.1 Recognise that assessing professional skills is a demanding, time-consuming task and that this key task be recognised in staff workloads and/or additional resources be provided to support academics in developing such skills.

2.2 Adopt appropriate incentives and/or allowances within academic workload models so that academics will invest more time and attention to their teaching activities such as the routine development of innovative, high-quality online and blended learning materials.

2.3 Instigate teaching awards on a discipline by discipline basis that both profile and reward excellence in teaching and innovation in the classroom and online with such awards duly recognised in the academic promotion process and recognised as a significant achievement in an academic career.

2.4 Accounting schools provide sufficient staffing resources for all forms of assessment that give an appropriate mix of individual and team assessment tasks for students to complete at all levels of their degree.

Recommendation 3: Accounting academics to maintain contemporary knowledge of professional practice

The following action points are suggested to facilitate this recommendation.

3.1 Under industry engagement or similar relationship strategies, provide study leave opportunities to academics for varying periods to facilitate meaningful engagement with professional practice to develop current knowledge, improve understandings of phenomenon and to prepare enriched teaching resources.

3.2 Academics to become more actively involved in engaging with practice, such as consulting, with the emphasis on transferring the experience directly into their teaching.

3.3 Promote and develop the teaching of accounting in the contexts in which it operates, with a focus on the development and use of actual and realistic case studies drawn from practice, thereby facilitating the teaching of accounting as social practice rather than as mere technical practice.

3.4 Accounting academics to participate in professional sessions such as annual congresses run by professional accounting bodies.

Recommendation 4: Expose students to the world of professional practice in accounting to assist in inculcating professional values, ethics and attitudes of accounting graduates across a degree

The following action points are suggested to facilitate this recommendation.

4.1 Require accounting students to complete a minimum of 40 hours per annum (for a full-time three-year program or equivalent hours part-time) of relevant work experience in professional practice and/or within the broad services sector across all years of their degree in order to graduate.

4.2 Increase the focus on, and resources dedicated to, developing work integrated learning or internships, field placements, university-based clinics, business simulations, competitions, executives-in-residence programs, the employment of suitably qualified teaching fellows drawn from the realms of professional practice without the requirement for PhD qualifications, as well as the adoption of innovative assessment tasks.

4.3 Provide careers counselling for students enrolled in accounting degrees.

4.4 Communicate through various means, such as orientation, assessment task design, guest speakers and other forums, the importance for accounting students to take greater personal accountability for the development of their professional knowledge, professional skills and professional values, ethics and attitudes.

4.5 Explicitly incorporate social, environmental and ethical content into accounting courses from a whole-of-degree perspective.

Recommendation 5: Accounting academics to maintain contemporary knowledge of the latest technologies in education and practice

The following action points are suggested to facilitate this recommendation.

5.1 Provide professional development opportunities and support for academics in the optimal use of modern communications and related technologies as platforms to facilitate improved learning outcomes. Examples of these may include platforms for collaborative and blended learning, assessment and feedback, delivery of degrees across multiple campuses in order to meet efficiency goals, personalised learning and improving the learning experience, across diverse student cohorts among others.

5.2 Inform academics of the latest software packages used by practitioners (for example, audit working papers technology) using industry contacts as a source of access.

5.3 Incorporate into accounting degrees big data and advanced analysis and interpretation courses.

5.4 Employ instructional designers with experience in key enabling technologies to assist accounting academics with the deployment of relevant technology in their teaching.

Employers (Recommendation 6)

Recommendation 6: Encourage and assist employers to work more closely with accounting schools in enhancing the applied dimensions of students' learning experiences

The following action points are suggested to facilitate this recommendation.

6.1 Provide appropriate staff, especially at senior levels, to accounting schools to present guest lectures and portray case study scenarios, both in the classroom and in the online format, and to be active and engaged members of accounting schools or degree advisory committees.

6.2 Co-operate and collaborate with accounting schools to implement executive-in-residence schemes.

6.3 Provide or extend vacation and other internship opportunities for accounting students.

6.4 Contribute relevant materials and the benefit of experience in the development of actual or realistic case studies for use across the accounting curriculum in both undergraduate and postgraduate accredited accounting degrees.

6.5 Encourage and support collaboration of academics and practitioners in the development of case studies drawn from the world of professional practice by means of the sponsoring of case study excellence awards by professional accounting bodies.

6.6. Arrange site visits for groups of accounting students to allow students to be exposed to episodes of accounting in organisational and social contexts.

Professional accounting bodies (Recommendations 7 and 8)

Recommendation 7: Use accreditation processes to ensure a demonstrated focus by higher education providers and accounting schools on the development of students' professional skills and the inculcation of professional values, ethics and attitudes in accounting degrees

The following action points are suggested to facilitate this recommendation.

7.1 Accrediting professional accounting bodies to work closely with accounting schools to identify key quality and impact performance indicators for incorporation in accreditation processes.

7.2 Collaboration of this genre would involve a number of initiatives, including addressing Standard 2 (curriculum) of the accreditation standards with explicit incorporation of professional skills, as well as professional values, ethics and attitudes as outlined in

Section 3 of the Professional Accreditation Guidelines for Australian Accounting Degrees issued by CPA Australia and Chartered Accountants Australia and New Zealand[2].

Recommendation 8: Use accreditation processes to work more effectively with accounting schools to lobby senior management of higher education providers and the Australian government for adequate ongoing levels of funding of such schools and their often large student cohorts, including retaining a greater share of income in order to deliver innovative, high-quality degrees and to fund further research development and support

The following action points are suggested to facilitate this recommendation.

8.1 Professional accounting bodies in conjunction with senior academics in accounting schools to maintain active engagement with higher education policy reform and sector-related plans and other information.

8.2 Professional accounting bodies in conjunction with senior academics to make submissions to government at all levels on matters related to funding, quality standards and degrees.

Accounting students (Recommendation 9)

Recommendation 9: Accounting students, with full encouragement of accounting schools, to individually and collectively foster greater awareness of the importance of developing and applying professional skills for life-long career and personal success and their personal accountability in this regard

The following action points are suggested to facilitate this recommendation.

9.1 Students pursue opportunities to be actively involved in business and social organisations where they can develop and apply their professional skills.

9.2 Students participate in seminars, workshops and other events held by professional accounting bodies, employers and careers and other sections of higher education providers and accounting schools that are designed to develop their skills in developing competitive applications for jobs and an enhanced awareness of employers' expectations.

9.3 Students participate in personal development, careers counselling and self-awareness courses offered by higher education providers and other parties for enhanced understandings of their strengths and limitations and the actions that may be taken to address the latter.

[2]http://www.cpaaustralia.com.au/cpa-program/professional-accreditation-guidelines/section-3-professional-skills-competency-areas-and-learning-outcomes

Connections of academics within the profession

The needs of key stakeholders in accounting education should be more explicitly incorporated into understanding and formulating accounting curricula and in the setting of the research agendas of accounting schools[3].

Higher education providers and accounting schools (Recommendations 10 to 12)

Recommendation 10: Stimulate greater engagement with key stakeholders

The following action points are suggested to facilitate this recommendation.

10.1 Senior management of higher education providers to regularly engage with the accounting profession in forums that address specific trends within the accounting profession and where potential impacts on accounting education and research are identified and explored.

10.2 All accounting schools to have active school or degree advisory committees that include industry representatives and to meet at least half-yearly to advise on matters related to curriculum review and development as well as research.

10.3 Accounting schools, professional accounting bodies and practitioners to enter mutually beneficial strategic partnerships to add value for all partners, such as named chairs of accounting or accounting schools and sponsorship of research centres, institutes or sub-platforms and research seminar programs.

10.4 Accounting schools to encourage strongly membership of, and active participation in, Australian professional accounting bodies as part of the criteria for appointment to academic positions at all levels.

Recommendation 11: Academics to work closely with industry in mutually beneficial research relationships

The following action points are suggested to facilitate this recommendation.

11.1 Academics to develop a better understanding of who the audiences are for their research (not just other academics) and get to know the needs of business and reduce the disconnect between "town and gown" through dialogue, mutual understanding and engagement.

11.2 Academics to become more active participants in industry engagement activities and initiatives to assist in the process of better appreciating big questions or potentially solving "wicked problems" for research agenda-setting purposes.

11.3 Academics to undertake more applied industry-focused research projects with potentially more scope for such research to be stimulated by business.

[3] Some of the recommendations stated in the previous section in respect to the relevance of the curriculum involve actions to enhance industry participation in accounting education. The following recommendations are additional to those recommendations and are not repeated in what follows.

Recommendation 12: Academics to translate the findings of their research into audience-appropriate language and channels

The following action points are suggested to facilitate this recommendation.

12.1 Academics to make greater use of outlets for conveying results to practitioners and the wider business community, such as daily newspapers, business magazines, professional accounting journals, commentator web sites, including *The Conversation*, and journals at the interface of accounting academe and practice, like the *Australian Accounting Review*.

12.2 Accounting schools to utilise the services of professional editors and journalists, and a project-importance basis, to assist academics in the preparation of audience-appropriate communication of research findings.

Employers (Recommendations 13 and 14)

Recommendation 13: Employers to liaise and collaborate with accounting academics in identifying and specifying mutually beneficial research projects under a co-creation of knowledge mindset for collective impact, thereby increasing the prospects of improving external research funding to the sector

The following action points are suggested to facilitate this recommendation.

13.1 Employers to provide seed or other funding subject to the relevance and quality of research proposals, for academics to engage in applied research.

13.2 Employers to engage with academics in the application for, and conduct of, Category 1 funding through the Australian Research Council Linkage Projects and other funding schemes in this category, and in other external research funding categories.

13.3 Employers to support the development and conduct of assessable projects for students set within the specific organisational and social contexts.

Recommendation 14: Provide greater opportunities for the formal mentoring of students by experienced practitioners on a regular, supervised basis as they undertake their accounting degrees

The following action points are suggested to facilitate this recommendation.

14.1 Qualified accounting practitioners with appropriate professional experience to volunteer to guide and support accounting students as mentors as they undertake their accounting degrees. Practitioners would, as mentors, gain enhanced understandings of the issues with, and concerns of, students in the sector and, as a result, their engagement would provide valuable input to accounting schools for deliberation and action.

Professional accounting bodies (Recommendation 15)

Recommendation 15: Professional accounting bodies to encourage and support the development of a strong and productive profession-wide strategic partnership between Australian accounting academe and professional practice

The following action points are suggested to facilitate this recommendation.

15.1 Professional accounting bodies to continue to encourage and sponsor worthy applied research projects, extending such programs, where possible, in terms of importance and grant funding allocations, and to assist academics in identifying relevant research projects.

15.2 Accounting schools, professional accounting bodies and academics to maintain awareness of government and regulator educational policies and of proposed policy reforms and to make submissions to inquiries or to white papers and to lobby policy makers and politicians in supporting and promoting the sector within the context of business education.

15.3 CPA Australia and Chartered Accountants Australia and New Zealand to expand the funding available for research through the current grants initiatives by 20–25 per cent across an initial period of three years.

Accounting students (Recommendation 16)

Recommendation 16: Encourage and support accounting students to take a stronger interest in understanding the dynamics of the accounting profession and business

The following action points are suggested to facilitate this recommendation.

16.1 Students to explore the evolving environment of the profession and the sector(s) in which they aspire to work.

16.2 Students to analyse potential future employers in order to understand what they do and gain an appreciation of their organisational values and culture as well as their strategic directions.

16.3 Students to join professional accounting bodies as (student) members[4] along with any accounting student association that operates at the higher education provider, where enrolled, and support the professional body and/or student association in industry engagement activities and initiatives.

Genuine reform of the sector

In making the recommendations above, it is appreciated that much previous endeavour, both locally and globally, to reform accounting education in recent decades has resulted in little genuine

[4] CPA Australia Network and the Chartered Accountants Australia New Zealand Student Affiliate membership

reform and produced limited results. Based on this appreciation, an additional recommendation is advanced.

Recommendation 17: The professional accounting bodies, together with AFAANZ, to create and maintain an *Accounting Education and Curriculum Change Network*

This network, for all in the accounting education community, would be charged with the responsibility of

- coordinating local education change efforts at a national level;
- calibration processes[5] in relation to threshold learning standards and benchmarking arrangements for higher education providers;
- acting as a clearing house for "best practice" in teaching and learning;
- coordinating information about professional development activities and industry engagement opportunities; and
- supporting greater meaningful connectedness between academe and professional practice in learning and teaching and in research and innovation. Membership would be drawn from all higher education providers offering accounting degrees.

Conclusion

This chapter puts forward for discussion and debate recommendations for higher education providers and accounting schools, employers, professional accounting bodies and accounting students. The recommendations are designed to address the issues raised by interviewees in the present study and in prior research with the aim of successfully taking accounting, in the context of business education, into the future.

The recommendations are built around the need to develop and broaden accounting graduates' skill base, especially in the professional skills areas of critical thinking, problem solving, teamwork and communication, and to inculcate professional values, ethics and attitudes so that they are well equipped to succeed in the workplace of today and the future. The recommendations are also constructed around how accounting schools can seek to build greater connections with professional practice through strategic business partnerships, student mentoring and other reforms. The final recommendation is concerned with developing a means to address and adopt a range of measures that will result in genuine reform of accounting education in Australia. The widening gap between academic and professional practice in accounting needs to be addressed without undue delay and the recommendations of this study reflect this view. The recommendations are proposed for discussion and debate but, more importantly, for contributing to a viable and long-term future for accounting education as both technical *and* social practice.

[5] Such as through achievementmatters.com.au

Appendix A: International education standards and skills

The IES define the term competence as follows.

> (a) emphasizes the ability of individuals to perform to standards expected of professional accountants, and (b) requires an appropriate level of knowledge, skills, values, ethics, and attitudes to achieve that competence (IES Framework, para 14).

There is acknowledgement that the level of competence is a function of the work to be performed and the circumstances in which is it done. *Technical competence* (IAESB, 2014) is demonstrated through various skills and knowledge.

Professional knowledge

Those topics that make up the subject of accountancy as well as other business disciplines, which together, constitute the essential body of knowledge for professional accountants.

IES 2 (para 14) outlines the broad content of professional accounting education as consisting of:

- accounting, finance and related knowledge;
- organisational and business knowledge; and
- information technology knowledge and competences.

The following extracts from IES 2 outline the scope of professional knowledge

> IES 2 (para 23) The **accounting, finance and related knowledge** component should include the following subject areas:
>
> - financial accounting and reporting;
> - management accounting and control;
> - taxation;
> - business and commercial law;
> - audit and assurance;
> - finance and financial management; and
> - professional values and ethics.
>
> IES 3 (para 25) The **organizational and business knowledge** component should include the following subject areas:
>
> - economics;
> - business environment;
> - corporate governance;
> - business ethics;
> - financial markets;
> - quantitative methods;
> - organizational behavior;
> - management and strategic decision making;
> - marketing; and
> - international business and globalization.
>
> IES 2 (para 28) The **information technology** component should include the following subject areas and competences:
>
> - general knowledge of IT;
> - IT control knowledge;
> - IT control competences;
> - IT user competences; and

- one of, or a mixture of, the competences of, the roles of manager, evaluator or designer of information systems.

Professional skills

The various types of abilities required to apply professional knowledge, and professional values, ethics and attitudes appropriately and effectively in a professional context.

IES 3 (para 3) outlines the skills professional accountants require and are grouped under five main headings:

- intellectual skills;
- technical and functional skills;
- personal skills;
- interpersonal and communication skills; and
- organizational and business management skills.

The following extracts from IES 3 outline the scope of professional skills.

> IES 3 (para14) **Intellectual skills** are often divided into six levels. In ascending order, these are: knowledge, understanding, application, analysis, synthesis (to combine knowledge from several areas, predict and draw conclusions) and evaluation. It is important that candidates have reached the highest levels at the point of qualification.
> Intellectual skills enable a professional accountant to solve problems, make decisions and exercise good judgement in complex organizational situations. These skills are often the product of a broad general education. The required intellectual skills include the following:
>
> a) the ability to locate, obtain, organize and understand information from
> b) human, print and electronic sources;
> c) the capacity for inquiry, research, logical and analytical thinking, powers
> d) of reasoning, and critical analysis; and
> e) the ability to identify and solve unstructured problems which may be in
> f) unfamiliar settings.
>
> IES 3 (para 15) **Technical and functional skills** consist of general skills as well as skills specific to accountancy. They include:
>
> a) numeracy (mathematical and statistical applications) and IT proficiency;
> b) decision modeling and risk analysis;
> c) measurement;
> d) reporting; and
> e) compliance with legislative and regulatory requirements.
>
> IES 3 (para 16) **Personal skills** relate to the attitudes and behavior of professional accountants. Developing these skills helps individual learning and personal improvement. They include:
>
> a) self-management;
> b) initiative, influence and self learning;
> c) the ability to select and assign priorities within restricted resources and to organize work to meet tight deadlines;
> d) the ability to anticipate and adapt to change;
> e) considering the implications of professional values ethics and attitudes in decision making; and
> f) professional skepticism.
>
> IES 3 (para 17) **Interpersonal and communication skills** enable a professional accountant to work with others for the common good of the organization, receive and transmit information, form

reasoned judgements and make decisions effectively. The components of interpersonal and communication skills include the ability to:

a) work with others in a consultative process, to withstand and resolve conflict;
b) work in teams;
c) interact with culturally and intellectually diverse people;
d) negotiate acceptable solutions and agreements in professional situations;
e) work effectively in a cross-cultural setting;
f) present, discuss, report and defend views effectively through formal, informal, written and spoken communication; and
g) listen and read effectively, including a sensitivity to cultural and language differences.

IES 3 (para 18) **Organizational and business management skills** have become increasingly important to professional accountants. Professional accountants are being asked to play a more active part in the day-to-day management of organizations. While previously their role might have been limited to providing the data that would be used by others, today, professional accountants are often part of the decision-making team. As a result, it is important that they understand all aspects of how an organization works. Professional accountants therefore need to develop a broad business outlook as well as political awareness and a global outlook. Organizational and business management skills include:

a) strategic planning, project management, management of people and resources, and decision making;
b) the ability to organize and delegate tasks, to motivate and to develop people;
c) leadership; and
d) professional judgement and discernment.

Professional values, ethics and attitudes

Professional values, ethics and attitudes are the behaviours and characteristics that identify accountants as members of a profession. IES 4 (para 15) states that

> the coverage of values and attitudes in education programs for professional accountants should lead to a commitment to:
>
> - the public interest and sensitivity to social responsibilities;
> - continual improvement and lifelong learning;
> - reliability, responsibility, timeliness, courtesy and respect; and
> - laws and regulations.

The following extracts from IES 3 outline the scope of professional values, ethics and attitudes.

IES 4 (para 16) While the approach of each program to the learning of **professional values, ethics and attitudes** will reflect its own national and cultural environment and objectives, as a minimum all programs should include:

- the nature of ethics;
- differences of detailed rules-based and framework approaches to ethics, their advantages and drawbacks;
- compliance with the fundamental ethical principles of integrity, objectivity, commitment to professional competence and due care, and confidentiality;
- professional behavior and compliance with technical standards;
- concepts of independence, skepticism, accountability and public expectations;
- ethics and the profession: social responsibility;
- ethics and law, including the relationship between laws, regulations and the public interest;

- consequences of unethical behavior to the individual, to the profession and to society at large;
- ethics in relation to business and good governance; and
- ethics and the individual professional accountant: whistle-blowing, conflicts of interest, ethical dilemmas and their resolution.

Appendix B: Interview schedule July 2014

The wording of the questions in this schedule reflected terms commonly used by academics, accounting firm employers, other employers and regulators. As such, the preferred terminology of the investigation – professional knowledge, professional skills and professional values, ethics and attitudes – are not specifically used.

1. What does an accountant do?
2. What will accountants be doing in 2024?
3. What will be the key competencies and/or minimum knowledge for accountants in 2024?
4. What changes to accounting education would be required to meet these key competencies and/or minimum knowledge requirements of 2024?
5. What problems do you believe exist currently in accounting education? Which three are the most important? What strategies can you suggest to address these problems?
6. Who are the key stakeholders in accounting education at tertiary level? What are their needs?
7. Do you believe, as suggested by previous studies, that there exists an overemphasis on the teaching of technical accounting skills at the expense of broader, generic skills as well as the impact of accounting at a social level?
    a. How can Higher Education Providers foster the development of these generic skills?
    b. Should this be done even if it means less coverage of technical skills?
    c. How can accounting schools 'teach' social context, incorporating accounting's impacts on organisations and society, into curricula?
8. Research suggests that not all accounting graduates are work ready and that not all graduates possess an understanding or appreciation of what is expected of them in a professional services environment. To what extent do you think this is true?
    a. What can the Higher Education Provider do to instil in the graduates the professional values needed to be employable?
    b. What can employers do to assist Higher Education Providers?
    c. Could alternative learning strategies assist?
9. What scope do you believe exists for practitioners in the development of skills in accounting students?
10. Given technology is changing how do you see this affecting accounting education/accounting/business in the short to medium term?
    a. What implications does this have for the provider/business in terms of staff and resources?
11. Is research or learning and teaching considered to be more important in the higher education sector?
12. How is academic accounting research of benefit to the accounting profession and business in general?
    a. If not seen as a benefit, why is this considered the case? or If seen as a benefit, in what ways does this materialise?
    b. Should academic research be aligned to be relevant to the needs of professional practice?
    c. Who determines what constitutes useful academic research?
    d. How can academic research be best incorporated into accounting education?

13. With recent government policy changes for the higher education sector, how do you think this will impact accounting schools and their ability to compete? (may be covered in questions 4 and 5)
14. What should universities be doing for professional practice?
15. When employing an accountant what is your preference in a graduate – university or non-university degrees/qualifications?

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