

Talent in the Accounting and Audit Profession: How to attract and retain the next generation of graduates into accounting and auditing

Research Report – March 2024



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1. Foreword

This report is in response to the call in 2022 by the Auditing and Assurance Special Interest Group (AASIG) of the Accounting and Finance Association of Australia and New Zealand (AFAANZ) and in association with the Australian Public Policy Committee (APPC) to investigate the perceived lack of talent in the audit profession.

The aim of this research is to provide insights on potential talent entering the accounting and auditing profession in New Zealand and Australia, specifically the choice of accounting at university entry level and the choice of auditing at the accounting graduate level. This New Zealand and Australia based research provides Trans-Tasman evidence on talent entering the accounting and auditing profession and it extends previous work by Jackling and Calero (2006) on 'Influences on Undergraduate Students' Intentions to become Qualified Accountants: Evidence from Australia'.

The objectives of the research are to:

- better understand what motivates students to choose accounting as a study discipline;
- better understand why students do not choose accounting;
- understand what motivates students to choose auditing as a specialisation;
- explore how the profession should change to be more appealing to future talent/students;
- understand if there are any groups that are more or less likely to choose accounting at university entry level and auditing on graduation; and
- propose how such diversity can be addressed and explore whether the content of accounting and auditing courses at university properly reflects the modern accounting profession.

To meet these objectives and gather perceptions about the lack of talent in accounting and auditing profession and suggestions as to how to attract and retain talent in the profession, surveys and interviews were conducted with various stakeholders – university students, graduates and employers in New Zealand and Australia. The research in this report has been generously financially supported by Chartered Accountants Australia and New Zealand (CAANZ) and CPA Australia. The research in this report was conducted in New Zealand and Australia by a team of university

educators, researchers and colleagues from Massey University and University of Technology Sydney (UTS).

We trust that findings of the research in this report will be useful to all stakeholders of the accounting and auditing profession.

2. Executive summary and summary of findings

This report presents research based on two online surveys¹ of 657 university students in Australia and New Zealand, in-depth interviews of 18 undergraduate university students, 16 university graduates and 10 employers in audit firms of various sizes from Australia and New Zealand.

2.1. Summary of findings

Our findings present that across all university student groups there is a sense of optimism regarding job prospects and career advancement opportunities in accounting and auditing. We do, however, find that enthusiasm diminishes as graduates enter the work force and have worked in accounting and auditing for several years. There are various reasons for this trend, and we discuss those further in the following paragraphs.

Responses by our study participants concerning the societal status of the accounting profession are modest, with around 60% favourable across all university student groups. Similarly, about 60% of university students, on average, believe that investing in the accounting study is a worthwhile endeavour. A comparable percentage of respondents maintains a positive outlook on the prospects of migration for accountants. There is also a high degree of optimism surrounding the transferability of accounting skills, and university students believe that advancements in technology are likely to enhance and complement accountants' expertise in the future. University students interviewed as part of this research who are studying or have recently studied auditing found the study of the topic to be highly interesting and engaging. These are positive findings that can be

¹ The two online surveys used in this study are:

(1) 'First year accounting survey', for first year business students who were studying a core accounting subject at the universities as part of their degree, with a total of 492 participants.

(2) 'Auditing survey', for students who are taking or had prerequisites to take the auditing courses within their degrees while studying at the School of Accountancy at Massey University and the Department of Accounting at UTS, with a total of 165 participants.

further enhanced by the accounting profession and employers by communicating the benefits of a career in accounting and auditing in the short and long-term.

Our study also shows that university students lack confidence in their aptitude for accounting and auditing work, particularly in their first year of university study. The impressions of university students are possibly influenced by insufficient exposure to real-world practical examples and the failure of accounting and auditing educators to provide students with appropriate practical context for their studies. The university students also tend to believe that they must have an innate ability to study accounting, rather than recognising that it is a skill that anyone can learn. Our recommendation is for the profession and its practitioners to communicate more clearly about the varied paths one can take to enter the profession and how to flourish in it.

Our study also shows that there is a lack of full understanding amongst university students about the role that accounting and auditing play in business and the society and the large variety of work and societal contributions that an accountant or auditor can provide during their working lives. Our recommendation is for the accounting and auditing profession to emphasise more prominently the nature and contribution that accounting and auditing make in business and society.

Similarly, our results show that there is low awareness by all university students of the importance of environmental and climate-related topics in their study and future careers. This is likely due to university educators failing to incorporate such topics into auditing courses curricula, neglecting these important and new fields of auditing and assurance. Our findings also suggest that university students still narrowly perceive the study of accounting and auditing with emphasis on technical topics, skills and capabilities rather than placing their accounting studies in wider business and societal contexts. The profession and employers have a role to play in informing both university educators and students about changes in the business world, including changes around environmental matters and practices that they work with, and the broader skill set that is likely to be required by a practitioner of the future.

In terms of university students' life at universities and the role student life has in attracting talent into accounting and audit profession, our results underscore the pivotal role of students' initial experiences with accounting courses – particularly at the entry level – in shaping the future accounting talent pool. That means that universities and accounting schools ought to create an

inclusive atmosphere that enhances students' experience and fosters a sense of belonging through engaging activities. This is especially important for attracting international students and on campus students. International university students in particular express very strong and positive sentiments in terms of the financial security and migration effects in their desire to further study auditing. These encouraging findings point to further opportunities for the profession to promote auditing study and careers to potential new entrants.

With respect to the influence of technology and AI on the accounting and audit profession, there is generally a positive sentiment regarding the future role of human professionals amidst technological advancements. These findings show that university students still mostly believe that human auditors will continue to play a role in auditing practice despite advancements in technology and that they see their role in such a future.

Our study also reveals some worrying trends and perceptions after university students enter the working world of accounting and auditing. The findings from our interviews of university graduates and young professionals show that many don't anticipate a long-term future in auditing. However, they are positive about remaining in the accounting profession over the longer term. Thus, auditing is seen as a career stepping stone. In general terms, they point to working conditions (working hours) and remuneration as reasons why they don't perceive being adequately rewarded for their work and as significant deterrents to pursuing a long-term career in auditing. Most of the university graduates are aware of the advantages of a career in auditing, however, they tend to put more emphasis on work-life balance from the start of their working life.

It also appears from our interviews of university graduates that the most significant influence on considering a career in accounting and auditing comes from their families, friends, and peers. Though influences like career growth opportunities and financial stability were important – it is likely that these are also reasons that families, friends and peers would support a career in accounting.

The interviewed university graduates are particularly critical of their preparedness for a working life and a career after finishing their tertiary studies. They consider that the tertiary education they received has generally not been anchored in practice and in the real business world. They suggest that university educators need to work closer with the industry and accounting and

auditing practices so to equip them with appropriate knowledge, skills, and insights of what a working life and a career in accounting and auditing is likely to be.

Our interviews with employers reveal their views about the lack of talent in accounting and auditing profession. The employers see that the lack of talent is evident in both the lower number of applicants for auditing graduate positions as well as the quality of applicants. The lack of talent that employers are observing is also evident, in their opinion, in the increased turnover of staff at junior levels, or as they term it, “employees’ unwillingness to stick it out” for three to five years, such as has been a norm in the past. The employers also characterise the lack of talent as apparent lack of resilience by new staff and graduates in the working environment. The employers also report constraints in conducting and completing audit engagements due to the lack of staffing leading to restricted capacity as well as potentially also leading to the reduction in audit quality in the future.

Therefore, the lack of talent in the auditing profession is particularly of concern for audit practitioners in the long-term, in respect of audit quality and the ability to undertake additional audit and assurance work. This, the employers propose, is potentially leading to difficulties in the supply of audits in audit markets as well as reduced trust in financial markets and the financial information that enables financial markets to operate and grow. The employers also suggest that the enduring lack of talent in the audit market may potentially lead to increases in audit fees.

Employers also partly attribute the lack of talent in the profession to the lack of appropriate skills that current graduates possess. Generally, the missing skills are technical skills in terms of understanding the practical side of accounting and auditing, as well as soft skills in terms of communication and the ability to work in teams. The employers attribute some of the lack of required skills to the COVID-19 disruptions in education as well as a deeper, possibly generational, source. Employers perceive that, university educators in particular have a role to play when it comes to preparing university graduates for their career paths.

Interestingly, the university graduates that we interviewed do not consider that there is a lack of talent in the accounting and auditing profession. They told us that they observe a lot of talented colleagues in their work environments. That is at odds with the feedback that we received from employers.

Looking at the possible ways to resolve issues around the lack of talent in the auditing profession, employers see that university educators, professional bodies and the profession in general have important roles play. They propose that information about the accounting and auditing profession needs to be disseminated early, as early as in high schools, and that interest in the profession should be initiated at the early level with assistance by professional bodies. They also suggest that the profession itself needs to better communicate about the purpose and benefits of auditing in general as well as the benefits of a career in auditing. The employers also consider that the current narrow focus on accountancy university graduates is not sustainable for the profession and that there should be a wider and more flexible approach to entering accounting and auditing profession in New Zealand and Australia.

Through our interviews we witnessed that employers sense a generational change and are concerned about it, realising that communication about the benefits of a career in auditing needs to be improved. They are, however, finding it difficult at times to understand the changing world and motivations of newer generations of graduates and how to address the challenges around generational differences in current business models. The employers attribute the responsibility about communicating the benefits of a career in auditing to professional bodies.

The research in this report overall provides some interesting insights. There is in general a positive attitude by university students towards the accounting and auditing profession. However, once the university students graduate, enter and experience working life, they appear to be less positive and somewhat disillusioned about continuing their careers in auditing. Our observation is that the major perceived contributor to that disillusionment is due to the perceived unfavourable working conditions and corresponding remuneration of graduates. The graduates also don't seem to be inclined to postpone work-life balance to achieve long-term career goals.

The perspectives of employers and graduates diverge regarding the lack of talent in the auditing profession. While employers report a lack of talent, the graduates tend to think that there is plenty of talent in the profession. That is likely to be a consequence of a differing definitions and perceptions of what constitutes talent. Employers should widen how they define talent in terms of some new and emerging skills, especially around IT and online communication that new generations bring into the working environment as well as be prepared to accept new generations' ideas of working life and a career in auditing.

Finally, there seems to be a need for work to be done collaboratively by all stakeholders in the accounting and auditing profession to attract and maintain talent. For university educators that means providing courses that are interesting, with reference to real-world business cases and practice, and well delivered in inclusive and stimulating learning environments. Professional bodies need to disseminate information about the advantages and the roles of accounting and auditing as early as high school and to keep opening opportunities for university students on all levels to learn about the profession. Professional bodies should also act as intermediaries between university educators and the practice by providing opportunities and introductions for exchanging knowledge and information about the accounting and auditing profession, and in that way enable bringing practice into classrooms.

The employers have a role to play in interacting with university educators, informing them about the developments in practice and opening opportunities for university students to observe or participate in practice. The employers also have a role to play in communicating about the importance of accountants and auditors in business and the society at large. Finally, given the feedback and opinions that university students and graduates provided in this study, employers need to consider changing attitudes that incoming university graduates have regarding work practices and the remuneration of young professionals in accounting and auditing. A failure by accounting firms to consider the expectations of incoming graduates may result in them being bypassed as a career destination.

3. Recommended actions

The findings of this study underscore the potential for increased communication efforts by all stakeholders to promote the accounting and auditing profession to prospective university students across Australia and New Zealand. Based on the findings these are the recommended actions for university educators, professional bodies, and employers.

3.1. Recommendations for university educators

In degrees where students choose their major after taking a core of broad business/commerce fundamental subjects, the earliest accounting subject should be taught by enthusiastic and passionate university educators to provide students with a highly positive and supportive learning experience. In later subjects – the design of the learner experience should be carefully crafted,

including the selection of university educators who are knowledgeable and passionate about student learning about accounting and auditing in particular.

University program or degree directors should consider how career development information and opportunities are created over the entirety of the study program, including exposure to the accounting professional bodies.

Both university educators and the professional bodies should endeavour to include more real-world examples from accounting practice into university students' curricula. University educators should take note of this finding when evaluating the learning design, assessment structure and the staff teaching their introductory accounting courses/subjects.

The professional bodies as well as employers should work with universities' career advice services in providing relevant information about auditing as a profession and as a career choice which could assist university students in choosing a career in auditing.

University educators working with the professional bodies and employers should emphasise to students the value and contribution that auditing provides in business and society at large. For example, pursuing a career in auditing contributes to the wider governance of businesses and protection of shareholders and the share market.

3.2. Recommendations for the professional bodies

We recommend for professional bodies to engage in better promotion of the long-term financial prospects of accounting and auditing professionals.

Professional bodies should consider finding the appropriate role models to talk to university students and graduates about life as an accounting and audit professional. Direct contact with auditors develops positive perceptions of the profession amongst undergraduate university students. The findings from interviews with university students in this study also indicate a positive change in university students' perceptions of auditing as a profession after studying a course in auditing and interacting with practicing auditors while studying. Based on these findings, the university alumni as well as various high school alumni who are now auditors need to share

their experiences in and prospects of the profession with high school as well as university students. This is likely to enhance the positive image of the profession amongst potential new entrants. Professional bodies could also play a role of intermediaries between the various stakeholders and the alumni in the profession to promote professional experience sharing.

The findings in this study also suggest that professional bodies could have a role in providing an opportunity for the accounting profession to promote and educate university students about the wider importance of accounting and auditing in the society beyond the pure technical aspects of accounting and auditing.

That is, both university students and university educators need to be better educated on the important developments in social, environmental and climate related accounting and assurance practices. University students should receive better and up-to-date information about the contribution that accountants and auditors make and are likely to further make to social, environmental and climate related reporting and auditing in the future.

3.3. Recommendations for employers

Results of interviews in this report point to different understandings of talent in the account and auditing profession between employers and university students and graduates. Employers might need to explore adjusting their definition and the understanding of talent in order to better leverage incoming generations of graduates' new skills and attitudes to the work environment, particularly around IT and online networking. There is also an opportunity for the profession and employers to embrace university graduates in Australia and New Zealand who are international students and, in both countries, to seek to provide advocacy on their behalf for easier pathways into the accounting working environment and into auditing careers.

The results of the surveys and interviews with university students and graduates in this study indicate that poor working conditions (in terms of long working hours) and the difficulty to achieve work-life balance and poor prospects to improve remuneration are major deterrents to attracting students and graduates into auditing profession. Employers could adjust audit graduates' remuneration to align it with other commercial roles or salaries in other business divisions within public accounting firms or other similar professions.

Employers could also better communicate about what they do in their practices by using various communication channels, including social media, to dispel incorrect information about the working conditions in auditing firms as well as to emphasise the important role that auditors have in business and society. Such communication should be informative and authentic and should not be presented in a way that is seen as a purely marketing exercise.

Employers should also engage with university educators to bring practice into teaching classes and to bring together “town and gown”. This serves to demystify the world of auditing, to better inform and motivate university students about auditing careers as well as to prepare university students and graduates for the “real world of practice”.

4. Background and Literature

4.1. Background to the study

The accounting profession is currently challenged by many changes in the business environment including advances in technology and globalisation. One of those challenges is how to continue to attract and retain new talent into the profession. Previous studies document a decline in accounting students' enrolments leading to a shortage of university-trained professional accountants (Birrell et al., 2005). The shortage of university-trained professional accountants was particularly evident during the COVID-19 crises and resulting border closures in Australia and New Zealand in the period between 2020-2022. The shortage of qualified audit professionals was also highlighted by professional bodies and regulators in Australia and New Zealand (CAANZ, 2021; Moison, 2022).

In response to this serious problem, the Auditing and Assurance Special Interest Group (ASSIG) of the Accounting and Finance Association of Australia and New Zealand (AFAANZ) in association with the Australian Public Policy Committee and the financial support of Chartered Accountants Australia and New Zealand (CAANZ) and CPA Australia initiated a research grant program intended to provide an opportunity to researchers to examine this important topic. The research in this report has been carried out in response to this initiative.

4.2. Literature review

Recent statistics released by the US Bureau of Labour Statistics project around 6% growth in demand for accountants and auditors in the ten-year period from 2021 to 2031. This growth rate is at par with the average growth in demand for all other occupations. However, regardless of this significant growth in demand, around 300,000 accountants and auditors have left their jobs, resulting in a 17% decline in industry employment, indicating that there is a serious shortage of accountants and auditors in the US (Mutoh, 2023; US Bureau of Labour Statistics, 2021). Researchers from other parts of the world such as Australia (Jackling and Calero, 2006), Sweden (Karlsson and Noela, 2022), South Africa (Oben and van Rooyen, 2022) and Ghana (Tetteh, 2012) report consistent results. A similar trend has been highlighted by professional bodies and regulators in Australia and

New Zealand (CAANZ, 2021; Mistry, 2021). However, concerns voiced by accounting practitioners and academics in relation to losing potential accounting students to other professions and a consequent shortage of students opting for accounting careers are not new (Ashworth, 1969; Carpenter and Strawser, 1970; Gul et al., 1989). Investigating the trend of inability to attract talent, Taylor and Dixon (1979) report a negative attitude of non-accounting students towards the accounting students and the profession.

In 1989, Gul et al. (1989) examined the perception issue regarding the accounting profession and reported that Australian and New Zealand accounting students were positive about their future earnings potential, availability of employment, and the duration of education while they placed less importance upon job satisfaction and aptitude for the subject. In a related work, Ahmed et al. (1997), while investigating factors affecting accounting students' career choice, reported that the factors which significantly affect accounting students' choice of career include financial and market factors while finding that intrinsic factors do not affect their career concerns. Tan and Laswad (2006) extended this line of inquiry into the profession by utilising theory of planned behaviour and include additional factors in their analyses to investigate the career choice of first year accounting and non-accounting students in New Zealand. Their findings indicate that referent groups play a significant role in the career choice of both accounting and non-accounting students. Furthermore, both groups believe that an accounting career requires higher mathematical skills and that it has a high workload rewarded by a high initial salary. However, non-accounting students believe that an accounting career is boring, nor does it provide greater job opportunities, high social status or broad business exposure. In 2009, Tan and Laswad (2009) conducted a follow up study to investigate changes in the perceptions of the same group of students in their third year. Their results indicated a significant difference in the intention and actual choice of both groups, i.e., a significant number of students intending to choose accounting as their career in the first year of study opted to choose a non-accounting career in the third year of study, while a significant number of students intending initially to have a non-accounting career opted for an accounting career. The authors further reported that the decision to change career choice or remain in the same career has been significantly affected by the opinion of the referent group including parents, friends, and career advisors, for those who changed their career choice there was a significant change in the opinion of the referent group, while for those who did not change their career path, there was no significant change in the opinion of the referent group. Besides change in the opinion of the referent group,

non-accounting students in year one who opted for an accounting career in year three developed interest for accounting during the intervening period. Other indicators across all the groups remain the same except for change in the attitude of students who opted for a non-accounting career in year one and remained with their choice in year three. A positive shift in the attitude of this group toward an accounting career did not change their decision. The attitude shift was influenced by a weakening perception of the boring and challenging nature of an accounting career, and a comparably stronger perception that an accounting career is financially more rewarding. The group maintained their strength of belief that an accounting career requires high mathematical skills. Similarly, Jackling and Calero (2006) found that Australian students' satisfaction with their preliminary accounting course significantly affects their intentions to pursue a career in accounting, which indicates the importance of accounting educators in promoting the profession.

These early Australian and New Zealand studies indicate a shortage of high-quality accounting professionals, that is, the supply side effect. Studies in other institutional contexts were also conducted along similar lines. For example, Kumar (2017) examined the case of Bangladesh and reports that students' personal interests and skills affect their career choice, i.e., that accounting students have strong mathematical skills but poor writing skills. Ali and Tinggi (2013) reported that Malaysian students' accounting career choice is triggered by high job prospects. Herman et al. (1995) reported similar results for a US sample, finding that economic factors are the major determinants of accounting career choice. Byrne et al. (2012) reported that for Irish accounting students, financial rewards and prestige are the key determinants leading them to opt for an accounting career, while for non-accounting students the most significant factors affecting their career choice included sense of fulfilment, high work-life balance and good citizenship. The influence of media has been identified as another factor affecting potential accounting students' career choice (Hoag et al., 2017).

More recent work investigating the perception of the accounting profession indicates that there is no major change, i.e., the profession still holds a negative perception amongst potential entrants. For example, based on a survey of first year and second year university students, Karlsson and Noela (2022) report that personal traits such as lack of personal interest, perception of accounting as boring, higher salaries in other fields, and normative beliefs including teachers' and peers' influence are the factors affecting students' attitude towards accounting as a career. Similarly, Chen et al. (2022), comparing accounting with three competing professions including engineering, medicine

and law, find that the US' Standard Occupational Classification System (issued by the U.S. Bureau of Labor Statistics) describes accounting as a purely technical administrative function and underestimates the need for communication, interaction, and analytical thinking abilities required by the accountants, while it overestimates their involvement in information processing, technical, and nonpersonal tasks. Thus, the Profiling system is one factor affecting the perception of the profession.

Awadallah, and Elgharbawy (2021) report that personal interest, future job prospects, referent group perception and instructors' influence are the significant factors affecting students' accounting career choice in Qatar. Oben and van Rooyen (2022) find that work satisfaction, earning potential, self-efficacy expectations, personal interest, availability of accounting as a subject, and already having a family member in the accounting profession positively influence students' perception of an accounting career. Similarly, Scott and McCrary (2021) find that students' experience of their first-year accounting course develops their interest in the subject and the profession and thus significantly influences their intent to major in accounting. Students who studied accounting in high school are also more likely to choose accounting as their major.

Besides the perception problem, other key impediments affecting the low interest in accounting profession include modest starting salaries compared to professions such as data science and technology, strict requirements for passing professional examinations, and slow change in the accounting curriculum in comparison to the fast-paced digital revolution (Dawkins, et al., 2020; Mutoh, 2023). Hatane et al., (2021) find that Indonesian students who had more information regarding careers in accounting have a high tendency to opt for a career in accounting, suggesting that the universities and professional bodies should share more information with potential new entrants.

The significant decline in the number of new entrants to accounting degrees has clear implications for the auditing profession. However, the literature investigating the perception of accounting students regarding the auditing profession is limited. The findings from this limited stream of literature depicts a gloomier picture. For example, Yavas and Arsan (1996) find that amongst the potential students who can enter the profession, the perception of auditing as an attractive career was worse than any other accounting or finance career – notwithstanding that the accounting students' perception of auditors and auditing was positive. However, students were still

uncertain about opting for an auditing career. Bessel et al. (2016) conducted a commissioned study on the supply of people/students into a career in auditing in Australia. Their findings indicate that the respect of the business community commanded by auditors, the influence over others and the ability for audit work to be interesting are determinants of the auditing career choice. The long working hours in auditing were seen as a deterrent to a career in auditing and advice by course counsellors at universities and HR consultants as well as influence by family members were also important in auditing career choice.

Pelzer and Nkansa (2022) investigated the perception of auditing as a profession amongst accounting students from different demographic backgrounds in the US, reporting that even though the general perception of auditing is positive, students from minority groups reported negative self-efficacy and negative experiences in relation to auditing which were the key impediments for them to join the profession. Furthermore, there were significantly fewer mentors available to students from the minority groups who had auditing exposure than for those with accounting exposure. Similarly, Tetteh et al. (2022) find that accounting students in Ghana have a positive perception of auditing in terms of monetary reward and prestige but the main impediment hindering them to enter the auditing career was the higher level of perceived job stress. Pauzi et al. (2021) report a similar perception problem about auditing careers amongst the accounting students in Malaysia, finding that only 36% of the students were passionate about an auditing job. The key negative perceptions were found to be about high work pressure and lower salaries. However, Thuy et al. (2022) find that accounting students in Vietnam hold a positive perception of auditing – they believe that an auditing job is interesting with career prospects and a sense of social contribution. They attributed their positive perceptions of auditing to their prior training, i.e., studying auditing as a course in their early university years. Utilising an experimental research design in Spain, Navallas et al. (2022) investigated the impact of becoming a member of an audit team for an entire workday on third year undergraduate students majoring in business administration and economics who have not yet decided a career pathway. Their findings suggest that direct contact by the students with auditors and audit firms reduced students' negative perception of the profession, assisted in developing positive perceptions of the profession and lead to greater inclination to work as an auditor in the future. Furthermore, those students who perceived that auditing is a public service as well as a profession have a greater tendency to join an audit firm.

Recent studies investigating the changing dynamics of the accounting profession and the dwindling number of quality entrants have also investigated the phenomenon from the demand side. This strand of literature does not depict a positive picture of the future of the profession in general (Pasewark, 2021). For example, recent statistics not only show a decline in hiring by the large accounting firms (Association of International Certified Professional Accountants, 2019) but an anticipated slump in the future demand for accountants (Bureau of Labour Statistics, 2016). Pasewark (2021) argues that this decline in demand is owing to automation of the processes, emergence of artificial intelligence, and offshoring of accounting functions to low-cost destinations. Those findings further suggest that deficiency of accounting curriculum in tackling the changing nature of the profession, and the lack of competency by the instructors in teaching the emerging technologies, coupled with high cost of accounting education is further putting a downward pressure on the availability of potential candidates to join the profession. Similar findings are reported by Herbert et al. (2021) in the UK, namely that offshoring, and business process re-engineering are significantly affecting the demand for accounting services in the UK while the rising cost of accounting education is significantly affecting the supply of accounting students. They also observe an expectations gap between employers and accounting education providers. However, Alderman (2021) suggests that artificial intelligence will largely affect the less technical and more highly repetitious accounting functions, rather than the mid-career functions. This trend, however, is also expected to affect the gender gap in the profession as these roles are currently largely occupied by female accountants. Rkein et al. (2019) examines the impact of automation on the accounting profession by interviewing employees, employers, instructors, and students. Their findings suggest that the demand for new roles requiring skills such as critical thinking and consulting is likely to significantly increase.

Regardless of the serious shortage of accountants and auditors, Big 4 auditing firms in the US have initiated job cuts indicating that there is, if not a decline, at least a shift in the demand of the profession. Our interviews with employers across Australia and New Zealand indicate that a potential cause of these job cuts is the workplace crisis precipitated by COVID-19, which has not only negatively affected businesses across various jurisdictions and industries, including auditors, but has also negatively affected the talent pool of new auditors entering the profession. Thus, these changing patterns might be a temporary phenomenon. Our findings are in line with Mutoh (2023), who is optimistic regarding the future demand for accountants and auditors in general. For example,

many experienced accountants have an opportunity to stretch into finance and related technological roles. Furthermore, in the coming 15 years, around 75% of the public accountants in the US will retire, creating more job opportunities for incoming professional accountants and auditors. The demand for tax accountants is particularly strong due to the rapidly changing operating environment caused by technological advancements and its associated tax implications. Similar results are reported by researchers in other countries. For example, Bowles et al. (2020) report that regardless of the automation of accounting functions in Australia and New Zealand, the skills and capabilities required to perform accounting functions will be in high demand, indicating sustainability of accounting careers in the future.

Keeping in view the digitalisation of accounting, the emergence of artificial intelligence, the reported acute shortage of accountants and auditors and declining accounting students' enrolments accompanied by the changing demand pattern of the profession, earlier researchers suggest various mechanisms to boost enrolment in the accounting programs and enhance the effectiveness of accounting graduates. For example, Scott et al. (2021) suggest that enrolment in account courses can be positively boosted by designing an engaging first accounting course, enhancing the high school accounting curriculum, mapping educational and career pathways, providing role models and mentors, and involving current accounting students in assisting high school students with financial aid applications. Karlsson and Noela (2022) suggest that organising supportive activities, improving pedagogical techniques, including internships and seminars in the curriculum, and using social media platforms to portray a positive image of the profession will attract more students to accounting degrees. Oben and van Rooyen (2022) are of the view that guidance, and support for learners interested in an accounting career will help attract more talent to the profession. Huels and Weber (2021) suggest that on campus accounting expos and events increase students' interest in studying accounting at the host university, enhance their awareness of job opportunities in the field, and positively influences their perceptions of accounting careers, thus, stressing the benefit of regular accounting expos on university campuses. Their findings further indicate that such initiatives can help combat the declining enrolment challenges, change the negative perception of accounting careers, and contribute to overall growth in enrolments.

McGuigan (2021) suggest that to cope with the changing environment, a major overhaul in accounting education is required to refocus beyond technical skills, encompassing professional values, ethics, and attitudes. Furthermore, accounting curricula should embrace complexity, and

ambiguity, and foster analytical thinking, innovation, problem-solving, leadership, and adaptability skills in accounting graduates. Dawkins and Dugan (2022) suggest that without significant changes, such as flexible education and licensing, higher salaries, and improved work-life balance, the negative trends in talent attraction towards the profession will persist. To address these serious issues, universities and accounting firms must actively recruit diverse high school students and update curricula to include necessary skills. To create more interest in the auditing profession amongst accounting students, researchers stress that sharing greater information about auditing (Thuy et al., 2022), providing more mentoring opportunities (Pelzer and Nkansa, 2022), and more involvement of the auditing firms and professional bodies with students (Pauzi et al., 2021) might be useful strategies.

In summary, the trends in relation to the accounting profession are observed across many jurisdictions such as Australia, New Zealand, Sweden, South Africa, and Ghana. Students' perception of accounting as dull, requiring high mathematical skills, concerns about job satisfaction, and low salaries of entry level accountants affect career choices. Auditing faces an even more negative perception. Furthermore, automation and offshoring of accounting jobs is affecting demand for accountants. Other challenges affecting the talent pool include the changing nature of the profession and an expectations gap between employers and educators. Additionally, the COVID-19 pandemic has caused shortages of staff, due to border closures, prohibiting major auditing firms from recruiting new entrants to the profession. However, in the long-term there seem to be good prospects for accountants and auditors. To address the decline in accounting students' enrolments and enhance accounting education, the literature suggests improving curricula, providing role models, and focusing on teaching skills beyond technical accounting knowledge. To increase interest in auditing amongst students and graduates, interested stakeholders should focus on sharing information about the auditing profession, providing mentoring, and involving auditing firms in students' education.

5. Research approach and methodology

Researchers in this study conducted online surveys and in-depth interviews of university students at two universities, Massey University in New Zealand (Massey) and University of Technology Sydney in Australia (UTS), to provide Trans-Tasman insights on potential talent entering the accounting and auditing profession in Australia and New Zealand, specifically the choice of accounting as a major at the University entry level and the choice of auditing as a career. Furthermore, we also conducted in-depth interviews with employers and early career accounting professionals in both countries currently undertaking their professional qualification programs and training to qualify as chartered accountants or certified practicing accountants. More information about the research methodology is provided below.

Two types of online surveys were developed and used in this study. The first online survey was answered by first year business studies students studying a core accounting subject at the two universities as part of their degree. The core accounting subject is either a mandatory course or an elective in their first year of study. This online survey tagged as '*First year accounting survey*' aimed to reveal influences on students' choice (or no choice) of the accounting major for the remainder of their business degree. The second online survey tagged as '*Auditing survey*' was answered by students who are taking or had prerequisites to take the auditing courses within their degrees while studying at the School/Department of Accounting at Massey University and UTS. The second survey aimed to reveal the influences on students' choice (or not choosing) to embark upon the audit specialisation as part of their intended career path.

Before launching the online surveys, pilot tests of the two questionnaires were conducted to eliminate, as far as possible, ambiguity or bias. The questionnaires were launched online by using Qualtrics, a leading provider of online research software. The First-year accounting survey was made available and advertised to students enrolled in their first year of business studies at the undergraduate level and postgraduate students who did not have an accounting bachelor's degree, but who were coming from a different non-business specialisation to study a Master of Professional Accounting degree. The Auditing survey was made available to students studying for a Master of Professional Accounting degree as well as students in their second and third years of undergraduate university study. These undergraduate university students had studied auditing courses either as mandatory courses or as their elective studies.

To gain further insights and a deeper understanding of the motivations for and the perceptions of pursuing careers in the accounting and auditing profession, in-depth semi-structured interviews of 18 selected university students were conducted. In addition, 16 accounting graduates who are working professionals and currently undergoing their professional qualification programs and training to qualify as chartered accountants or certified practicing accountants were also interviewed. Through these surveys we obtained perceptions of the accounting and auditing profession from study participants, ranging from early undergraduate university students through to postgraduate students and candidates who are completing their professional certification in accounting and currently working in the profession. Lastly, 10 accounting and auditing employers in Australia and New Zealand, across the Big 4, mid-tier and small/regional firms as well as the public sector, were interviewed to gain employers' insights regarding the attraction of the accounting and auditing profession. Each interview was about an hour in length, allowing the researchers to ask open-ended "why" and "how" questions to supplement the information available from the closed questions utilised in the online questionnaires. All interviews were recorded and transcribed with the consent of the interviewees.

6. Survey results

The following section reports on the results of the survey of accounting university students across Australia and New Zealand.

6.1. Sample composition

Table 1 presents the composition of the sample for the surveyed first-year students who studied the core accounting course at the two universities in 2023. The total sample size is 492 respondents, consisting of 90 respondents (18.29%) from New Zealand and 402 respondents (81.71%) from Australia.

Panel 1: Gender Distribution

Panel 1 of Table 1 categorises the sample by gender. The data reveals that a large proportion of respondents from both New Zealand and Australia are female (over 60%), while males make up 32% of the New Zealand sample and approximately 37% of the Australian sample.

Panel 2: Student Type (Domestic vs International)

Panel 2 of Table 1 categorises the sample based on the type of students, distinguishing between domestic and international students. More than 85% of respondents from both countries are domestic students.

Panel 3: Study Mode (Distance vs On-Campus)

Panel 3 of Table 1 segments the sample by the mode of study, specifically distinguishing between distance education and on-campus learning. The Australian sample predominantly consists of on-campus students, representing approximately 88% of the total Australian respondents, while the percentage of distance mode student respondents is less than 10%. In contrast, New Zealand respondents have a higher representation of distance mode students, constituting around 60% of the sample, with on-campus students making up approximately 39% of the New Zealand respondents. This difference between the Australian and New Zealand students' mode of study is as expected since Massey University is well known for the distance delivery of their programs.

Table 1: First year accounting survey sample composition

	New Zealand (Massey University)		Australia (University of Technology Sydney)		
Panel 1: Based on gender					
	Percentage	Number	Percentage	Number	Total
Male	32.22%	29	36.82%	148	177
Female	66.67%	60	61.94%	249	309
Non-binary / third gender	0.00%	0	0.50%	2	2
Prefer not to say	1.11%	1	0.75%	3	4
Total	100%	90	100%	402	492
Panel 2: Based on student type (Domestic vs International)					
	Percentage	Number	Percentage	Number	Total
Domestic student	87.78%	79	85.57%	344	423
International student	11.11%	10	14.14%	57	67
Did not respond	1.11%	1	0.25%	1	2
Total	100%	90	100%	402	492
Panel 3: Based on Mode (Distance vs On-campus)					
	Percentage	Number	Percentage	Number	Total
'Distance' or 'Remote' or 'Block' student who does not/rarely attend on campus lectures physically [Distance]	60.00%	54	8.95%	36	90
On campus student who attends physical/ face to face lectures [On campus]	38.89%	35	87.82%	353	388
Did not respond	1.11%	1	3.23%	13	14
Total	100%	90	100%	402	492

In Table 2, we present the sample composition of students who completed the Auditing survey at both universities. The total sample includes 165 respondents, with 118 (71.5%) hailing from New Zealand and 47 (28.5%) from Australia.

Panel A: Gender Distribution

Panel A of Table 2 categorises the sample for the auditing survey based on gender. It reveals that approximately 68% of New Zealand respondents are female and around 32% are male students. In contrast, among Australian respondents, about 47% are female, and approximately 49% are male.

Panel B: Student Type (Domestic vs International)

Panel B of Table 2 provides insights into the student type, differentiating between domestic and international students. Notably, 96% of the New Zealand respondents are domestic students, with only a small percentage representing international students. On the other hand, approximately 62% of Australian respondents are domestic students, while the remaining 40% are international students.

Panel C: Study Mode (Distance vs On-Campus)

Panel C of Table 2 reports on the mode of study chosen by the students. Around 80% of New Zealand students are engaged in distance education, while about 20% opted for on-campus learning. In contrast, the composition of Australian students is the opposite, with roughly 80% participating in on-campus education, and the remaining 20% pursuing distance education.

We believe that the similarities and differences between students from Australia and New Zealand, on the basis of gender, mode of study and student type provide for a good representation across student cohort in both countries.

Table 2: Auditing survey sample composition

	New Zealand (Massey University)		Australia (University of Technology Sydney)		
Panel 1: Based on gender					
	Percentage	Number	Percentage	Number	Total
Male	32.22%	38	48.94%	23	61
Female	66.80%	80	46.81%	22	102
Non-binary / third gender	0.00%	0	2.13%	1	1
Prefer not to say	0.00%	0	2.13%	1	1
Total	100%	90	100%	402	165
Panel 2: Based on student type (Domestic vs International)					
	Percentage	Number	Percentage	Number	Total
Domestic student	95.76%	113	61.70%	29	142
International student	3.40%	4	38.30%	18	22
Did not respond	0.84%	1	0.00%	0	1
Total	100%	118	100%	47	165
Panel 3: Based on mode (Distance vs On-campus)					
	Percentage	Number	Percentage	Number	Total
'Distance' or 'Remote' or 'Block' student who does not/rarely attend on campus lectures physically [Distance]	22.88%	27	78.72%	37	64
On campus student who attends physical/ face to face lectures [On campus]	76.27%	90	21.28%	10	100
Did not respond	0.85%	1	0.00%	0	1
Total	100%	90	100%	47	165

6.2. Results/findings: First year accounting survey

6.2.1. Influences on the choice to study accountancy

In Figure 1, we explore the responses of the first-year university students to the question on what influenced their decision to study the accounting courses, which could be either mandatory courses or electives. Notably, about 40% of the New Zealand respondents indicated that they opted for accounting studies because that was a mandatory part of their academic program. A sizable 69% of Australian students made the same choice due to their business studies program requirements.

Approximately 22% of New Zealand respondents cited the influences of peers, friends, or parents as factors behind their choice to study accounting. For Australian students, this influence was lower at around 13%. Further, around 17% of New Zealand students reported that their decision to study accounting was influenced by their schools' career advisors, as well as marketing efforts by the university, accounting profession, or the business community. In the case of Australian students, only 13% attributed their choices to such counselling or marketing efforts.

These findings underscore the potential for increased marketing efforts to promote the accounting profession to prospective students, particularly in Australia, where there appears to be room for the greater awareness and outreach in promoting the accounting profession.

6.2.2. Perceptions about accounting as a career

In Table 3, we examine responses to nine questions that delve into students' perceptions related to an accounting career. We conducted analyses of these responses by considering factors such as the student type and their mode of study.

Across all student groups, there is a sense of optimism regarding job prospects and career advancement opportunities in accounting. About 75% of students express generally positive sentiments in this regard. However, international students exhibit slightly less optimism compared to domestic students, with around 67% sharing positive perceptions regarding their on-job prospects and career advancement. This finding is probably due to immigration difficulties that international students encounter in both countries after their tertiary studies. On whether accounting has a promising future, the surveyed university students were less optimistic, with 68%

of New Zealand's university students responding positively and 63% of Australian university students feeling the same way. International university students in general are less optimistic than other groups with only about 58% responding that accounting has a promising future. This finding could also be explained by the perception that international graduates have challenges securing work in Australia and New Zealand post study and accessing opportunities for accounting roles in the future. There is an opportunity for the profession to embrace graduates in Australia and New Zealand who are international university students and, in both countries, to provide advocacy on their behalf for easier pathways into accounting work and accounting careers.

In general, there is a major perception by surveyed university students in both countries that accountants have high remuneration potential (82% positive in New Zealand and 76% positive in Australia), however, international students are less positive, with about 62% positively regarding their remuneration potential.

Responses concerning the status of the accounting profession are more modest, with around 60% favourable across all university student groups. Similarly, about 60% of students, on average, believe that investing in accounting study is a worthwhile endeavour. A comparable percentage of respondents maintains a positive outlook on the prospects of migration for accountants. Additionally, there is a high degree of optimism surrounding the transferability of accounting skills, and university students believe that advancements in technology are likely to enhance and complement accountants' expertise in the future. Positive responses to questions related to these aspects of the profession exceed 80% on average.

Figure 1: Influences to study accounting subjects

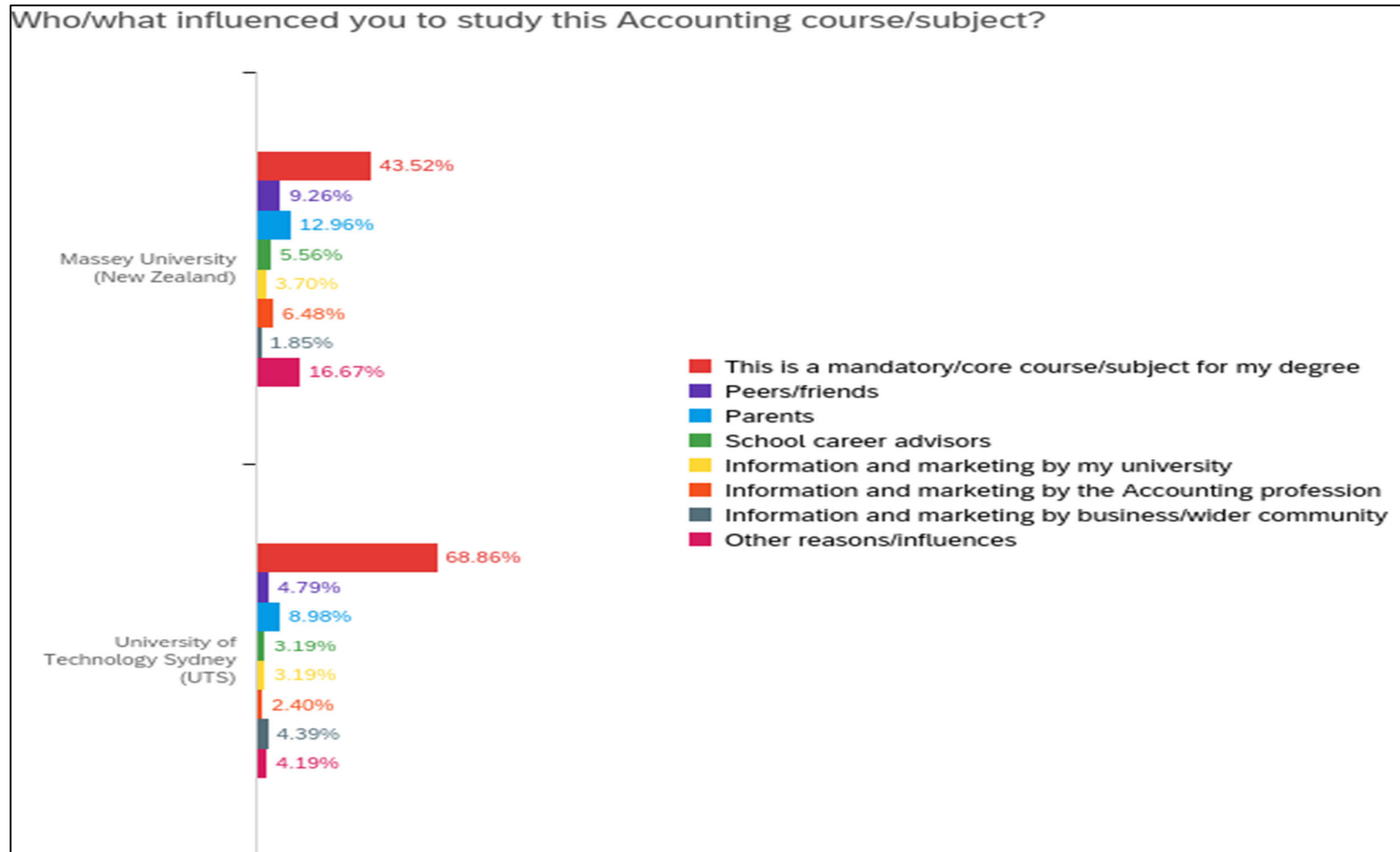


Table 3: Perceptions about Accounting as a career

Perception of Accounting from career views	New Zealand (Massey University)	Australia (UTS)	Distance	On Campus	Domestic	International
There are good job prospects in accounting	79.07%	81.05%	81.25%	80.28%	82.85%	66.67%
High remuneration/earnings potential	82.36%	76.31%	81.25%	76.54%	79.90%	61.90%
Good opportunities for career advancement	82.56%	74.38%	83.75%	74.09%	77.34%	66.66%
Accounting as a profession has a promising future	68.23%	63.08%	72.50%	62.57%	65.11%	58.07%
High status of the accounting profession	70.93%	57.85%	68.75%	57.94%	61.46%	53.97%
High transferability of accounting skills across different businesses and countries	84.89%	81.77%	83.75%	82.40%	83.55%	74.60%
Technology is going to enhance accounting expertise in the future	79.07%	79.34%	81.25%	78.55%	80.21%	73.01%
Cost of studying to qualify as an accountant is a worthwhile investment	65.88%	62.43%	73.75%	60.22%	63.02%	62.29%
There are good migration prospects related to accounting studies/careers	65.48%	56.79%	71.25%	54.21%	57.96%	60.00%

6.2.3. Personal interests in accounting

In Table 4, we compile findings from responses to seven questions regarding students' personal interests in accounting. We further analyse these responses based on the country of study, mode of study, and student type.

The results reveal intriguing trends. Approximately 70% of New Zealand university students, and notably 77% of distance learners (who are predominantly New Zealand students), express their strong interest in accounting. In comparison, about 60% of Australian students (who are predominantly on-campus students) share similar interest. Among student groups, international students are less inclined to find accounting interesting, with only 54% expressing strong interest in accounting, as opposed to 63% of domestic students.

A parallel pattern emerges when we examine students' self-perceived aptitude for accounting. Distance students rank highest, with 57% believing they have a strong aptitude for accounting, followed by 52% of all New Zealand students. In contrast, international students are least confident in their accounting aptitude, with only 41% expressing positive sentiments about their aptitude for accounting. Approximately 46% of Australian students express confidence in their aptitude for accounting. This may possibly be influenced by students not getting enough exposure to real-world business examples from practice and the accounting practitioners failing to provide them with appropriate practical context for their studies. Furthermore, the comparatively lower ranking for accounting aptitude by the on-campus students may also be influenced by their lack of prior work experience in accounting, as the on-campus students are generally younger with less real-world business exposure compared to the more mature distance mode students. Both educators and the profession should endeavour to include more examples from accounting practice into their students' curriculum.

Regarding the influence of career advice, only 10% of all students attribute their interest in accounting to career advice they received prior to their accounting studies, except for international students, of whom 23% found prior career advice influential.

Approximately 60% of university students across all groups believe that a career in accounting allows them to positively impact businesses and society. When considering various sub-groups – results are similar. Around 60% of distance students express their belief that a career in accounting

provides them with a meaningful life, while this sentiment is again less prevalent among the international students, of whom only 40% share such a perspective. When assessing these responses by geography, there is a discernible difference between New Zealand and Australian students' responses, with 55% and 38% of the respondents respectively considering an accounting career as meaningful. This points to the need for both educators and the profession in general to inform students about the role that accounting plays in business and society as well as the large variety of work and societal contributions that an accountant can make during their working life.

Table 4: Personal interest in accounting

Perception of Accounting from personal interest views	New Zealand (Massey University)	Australia (UTS)	Distance	On Campus	Domestic	International
Accounting is interesting	69.41%	60.66%	77.50%	59.55%	63.44%	54.09%
I have a strong aptitude for accounting	51.77%	46.39%	56.96%	46.07%	48.17%	40.99%
A number of my friends are studying accounting	25.89%	40.45%	18.75%	41.86%	37.34%	40.98%
I was advised by a career advisor to study accounting	10.59%	13.82%	10.00%	13.44%	11.71%	22.95%
My parents were in favour of me studying accounting	42.36%	43.37%	38.75%	44.26%	42.19%	49.18%
A career in accounting would provide me with an opportunity to influence/impact businesses and society	67.06%	58.06%	65.00%	58.60%	60.21%	55.73%
Working in accounting is likely to provide meaning and purpose in my life	55.29%	37.67%	60.00%	37.08%	40.99%	40.98%

6.2.4. Factors influencing further study of accountancy at university

First year university students were also asked for their views on factors that could influence them to continue studying accounting at university. Table 5 presents insights into influences based on students' academic experience, their sense of belonging within the educational community, and their perceptions of career prospects on their choice of further study in accounting. The results unveil noteworthy trends across various student groups.

In terms of the overall learning experience, university students across all groups expressed very positive views on the influence of their learning experience on their choice of further study in accounting. This includes their performance, enjoyment of coursework, the quality of teaching, and the online and on-campus learning experiences. In all these aspects, their positive perceptions exceeded 80%, apart from New Zealand university students, of whom 72% positively rated their perceptions of their on-campus learning experience.

Responses varied in regard to university students' sense of belonging within the academic community as an influence on their further study of accounting. Overall, New Zealand university students exhibit the lowest positive sentiment in this regard, with only around 62% suggesting that academic community influences their further study in the field. This is followed by the distance mode of education group at 68%. Conversely, the international student group is the most highly influenced group by their community in regard to continuing studying accounting, at 80%. Australian and on campus students reflect similar sentiments at about 74% on average. These results underscore the importance of universities creating an inclusive atmosphere that enhances university students' study experience and fosters a sense of belonging through varied engaging activities. This is especially important for international and on campus students.

Turning to career prospects, over 70% of respondents from all groups believe in a strong demand for accountants. That belief influences their further study of accounting. Around 80% of respondents across all groups are positive about the strong financial security offered by accounting career and that influences their further study in the field. More than 60% of university students across the board perceive significant migration potential for accountants and consider it an influential factor for further study of accounting. Furthermore, over 75% of respondents in all groups believe that a career in accounting provides a sense of purpose in their life and impacts their decisions to continue their accountancy studies. This is slightly at odds with the previous responses

on the perception of how accounting can provide meaningful contribution to business and society at large, however, the respondents clearly see that on the individual level there are purposeful paths for them in the accounting profession. These encouraging individual prospect-related findings suggest opportunities for the profession to further promote the benefits of a career in accounting to potential new entrants.

Table 5: Factors influencing further study of accounting at university views

	New Zealand (Massey University)	Australia (UTS)	Distance	On Campus	Domestic	International
Overall course satisfaction	84.34%	89.35%	83.78%	89.32%	88.12%	89.48%
My academic performance so far in accounting	84.33%	88.50%	82.43%	88.75%	87.29%	89.65%
Enjoyment of topics covered so far	83.13%	88.76%	87.84%	87.55%	87.02%	91.23%
Quality of the delivery of topics by lecturers	83.13%	91.12%	86.49%	89.90%	89.23%	91.22%
Quality of online learning experience	83.13%	83.97%	86.49%	83.04%	83.38%	85.97%
Quality of the overall learning experience	91.46%	91.09%	89.04%	91.37%	91.12%	91.23%
Quality of the live on-campus classes	72.22%	85.94%	N/A	83.97%	83.78%	88.46%
Feeling part of a community in my subject/course/degree	62.20%	74.48%	68.49%	73.51%	70.56%	80.70%
Strong industry demand for accounting graduates	78.04%	74.40%	72.60%	75.22%	75.21%	73.68%
Financial security offered in accounting roles	82.93%	82.64%	80.56%	82.94%	82.63%	82.46%
Migration prospects specific to accountants	69.14%	61.02%	63.01%	61.97%	61.73%	68.42%
The desire for a career with purpose	84.34%	74.63%	75.68%	76.64%	77.71%	70.17%

6.2.5. Future issues related to the accounting profession

In Table 6, we explore responses to issues related to the future of the accounting profession, particularly considering technological advancements and the emergence of artificial intelligence (AI).

Responses regarding the potential replacement of accountants by new technologies or AI yield intriguing insights. International university students exhibit notable concerns about the impact of these emerging trends on the accounting profession, with approximately 63% of the respondents believing that technology (AI) will supplant the need for accountants. In contrast, distance mode and New Zealand-based students express the least apprehension about technology, with only 37% to 43% of the respondents being concerned about technology and 31% to 32% being concerned about AI in particular replacing accountants. Australian university students' responses are in the middle of these percentages, with 58% expressing concerns about technology and 42% about AI replacing accountants.

Furthermore, approximately 70% of respondents across all groups are of the opinion that there will always be a need for human accountants as trusted advisors. International students are more sceptical with less than 60% believing that to be the case. Likewise, there is a strong belief across all groups for the need for human auditors and assurance providers, with more than 70% of respondents sharing this view. New Zealand university students, in particular, express firm belief in auditors' future in spite of advancements in technology (around 85%), while international university students are somewhat less convinced (at around 60%). These findings reflect the varying but overall positive sentiments regarding the future role of human professionals in the accounting field amidst technological advancements.

6.2.6. Importance of topics in accounting education

In table 7, we explore our findings relating to the students' perceptions of various topics that they consider as needing to be integrated and emphasised in accounting courses curriculum. It is noteworthy and reassuring to observe that university students attach great importance to ethical considerations, as ethics and related topics emerge as the most prioritised in our survey findings. Across all student groups, over 70% of respondents believed that topics on ethics are very important to the accounting profession. For New Zealand respondents, this figure stands notably high at 86%,

while the international student group is an exception, with only around 60% of international students emphasising the importance of ethics in their accounting coursework.

The next highly ranked topic of importance concerns technical rules and regulation, with more than 75% of responding students from all groups recognising those topics' significance. Surprisingly, students consider environmental, climate-related, and indigenous business topics as least needing emphasis. Across all groups, the responses about environment, climate and indigenous business topics are around 50%, indicating that these areas receive comparatively lower prioritisation in their thinking. These findings suggest that students still perceive a study of accounting in a rather narrow way with emphasis on technical topics, skills, and capabilities rather than placing their accounting studies in a wider business and social context. These findings also provide an opportunity for the accounting profession to promote and educate about the wider importance of accounting in society beyond the purely technical aspects of accounting.

6.2.7. Impact of early study of accounting on potential accounting career

Figure 2 illustrates students' responses regarding the likelihood of pursuing a career in accounting, both before and after their exposure to early or introductory accounting coursework at a university. The results yield interesting insights, especially when comparing Australian and New Zealand university students.

The findings for Australian university students are promising. The responses by students who are somewhat or extremely likely to choose an accounting career after an introductory accounting course and some exposure to accounting studies increased from 35% before exposure to 44% afterwards. Simultaneously, the percentage of university students who were somewhat or extremely unlikely to pursue an accounting career after such previous studies declined from 44% to 38%. This suggests that their introduction to accounting studies has been positive, and it has positively influenced their interest in the profession.

However, the results for New Zealand university students take a different trajectory. Prior to studying accounting, those who were somewhat or extremely likely to opt for an accounting career after studying an introductory accounting university course reduced from 40% to 34%. Meanwhile, the proportion of students who were somewhat or extremely unlikely to pursue an accounting career increased from 23% to 28% after being exposed to accounting coursework in their first year

of university study. These results underscore the pivotal role of students' initial experiences with accounting courses, particularly at the entry level, in shaping the future accounting talent pool. University educators should take note of this finding in how they structure their introductory accounting courses, how such courses are delivered and how to appropriately staff introductory accounting courses. It should be noted that Massey University differs from UTS in that it does offer online delivery of its accounting programs, whilst UTS is primarily an on-campus university and only offered online classes for a short period during the COVID-19 pandemic.

Table 6: Future issues related to the accounting profession

Perceptions on future issues related to Accounting	New Zealand (Massey University)	Australia (UTS)	Distance	On Campus	Domestic	International
Advancements in technology and software will replace the need for accounting skills	43.21%	57.67%	36.99%	58.95%	53.39%	63.47%
Advancements in artificial intelligence (AI) will replace the need for professional judgment by humans	32.10%	41.72%	31.51%	41.98%	38.98%	46.15%
Human accountants will always have a place as trusted advisors	70.37%	69.94%	72.60%	69.45%	71.47%	59.62%
There will always be a need for human input to provide audit/assurance information	85.18%	73.53%	82.19%	73.99%	78.19%	59.61%

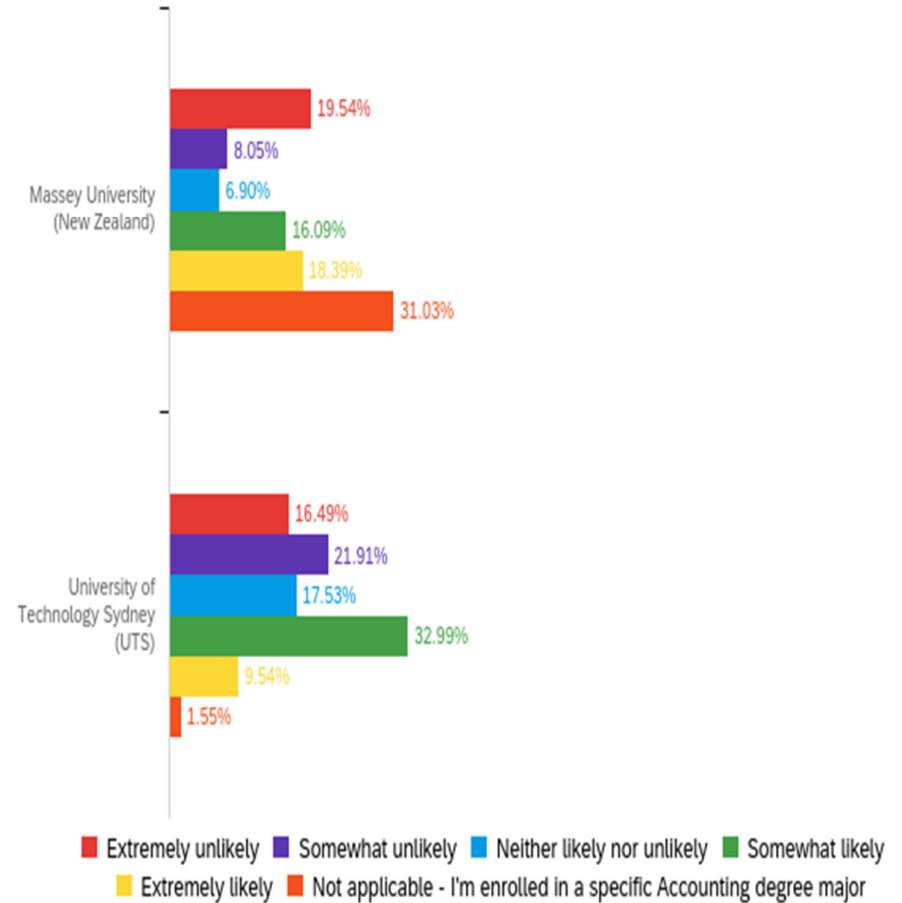
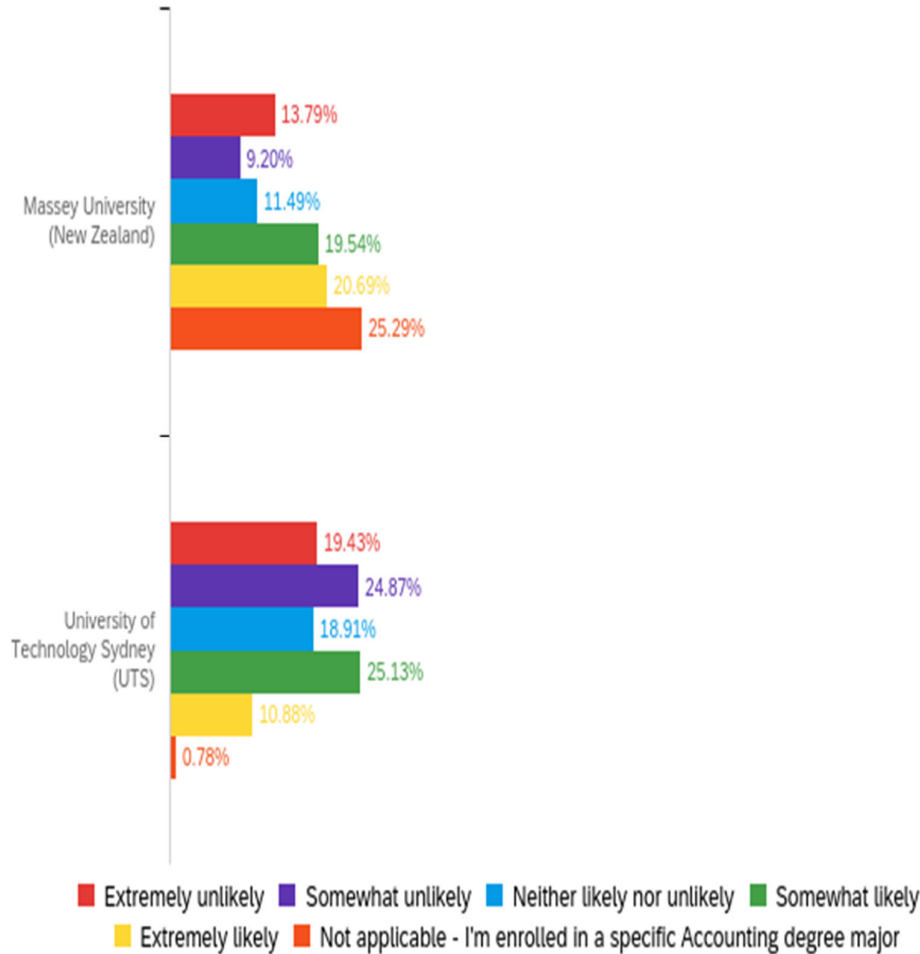
Table 7: Importance of topics in accounting education

Future Accounting topics importance	New Zealand (Massey University)	Australia (UTS)	Distance	On Campus	Domestic	International
Technical accounting rules and regulations	83.75%	77.50%	81.94%	78.30%	79.83%	71.16%
Ethics	86.25%	72.82%	84.72%	72.96%	77.52%	61.54%
Social and corporate responsibility related topics	75.00%	70.85%	75.00%	70.35%	72.25%	67.31%
Environmental and climate related topics	51.25%	55.31%	58.33%	53.77%	55.04%	51.92%
Indigenous business-related topics	51.25%	49.52%	58.33%	47.95%	49.71%	51.92%

Figure 2: Impact of early study of accounting on potential accounting career

At the start of your university studies, how likely were you to study accounting?

Now that you've had some exposure to accounting, how likely are you to select Accounting as your major?



6.3. Results/Findings: Auditing students survey

6.3.1. Influences on the study of auditing courses/subjects

In Figure 3, we present the responses of the surveyed auditing students regarding the influences for their decisions to undertake the study of auditing. Notably, approximately 70% of both New Zealand and Australian university students indicated that they are studying auditing because auditing courses are a compulsory part of their accounting degree academic program.

A smaller but noteworthy percentage, of around 6% of New Zealand respondents and approximately 8% of Australian respondents, are attracted to auditing due to information sharing and marketing efforts by professional bodies around auditing as a profession. For New Zealand university students, parental influence emerges as a notable and important factor in studying auditing and as a potential career choice, with around 4% of respondents mentioning their parents as main motivators. In contrast, Australian university students cite peer and friends' influence and to some extent career advice from their schools as prominent factors in their future auditing career choice, with each represented by approximately 4% of responses.

These responses shed light on the important factors guiding students in their decisions to pursue auditing study and careers, highlighting the role of compulsory coursework as well as marketing efforts by professional bodies as very significant influences. Additionally, family and peer influences, as well as school-based career advice do play a role in shaping auditing students' academic choices.

6.3.2. Perceptions about auditing as a career

In Table 8, we examine responses to nine distinct questions that delve into auditing students' perceptions related to the auditing career. We conduct analyses of these responses by considering factors such as the students' type and their mode of study.

Across all university student groups, there is a notable sense of optimism regarding job prospects in auditing, the career advancement opportunities, and future promising opportunities in the field of auditing. Approximately 70% of students, in general, express positive sentiments in this regard. However, international students exhibit slightly less optimism compared to other groups, with only around 65% of respondents sharing these positive perceptions.

Conversely, when it comes to earnings potential for auditors, students are less sanguine. Australian university students display the least optimism, with only about 46% of the respondents believing that auditors can enjoy favourable earnings potential. International students follow closely at 55%, while New Zealand-based university students hold a slightly more positive perspective, with approximately 66% of respondents expressing optimism in their earnings potential as auditors. This particular finding is insightful as it underscores the discussion around employers enhancing compensation of auditors to attract and retain talent within the auditing profession.

Responses concerning the status of the auditing profession are generally modest, at around 60% of respondents seeing the status of the auditing profession in a favourable light. However, Australian students have less belief that investing in their study of auditing is a worthwhile endeavour (only 56% of students). A comparable percentage of respondents maintain a positive outlook regarding the prospects of migration for auditors. Nevertheless, there is a high degree of optimism surrounding the transferability of auditing skills, and students believe that advancements in technology are also likely to augment auditors' expertise. Positive responses to questions related to these particular aspects of studying auditing exceed 80% on average.

Figure 3: Influences on studying auditing courses/subjects

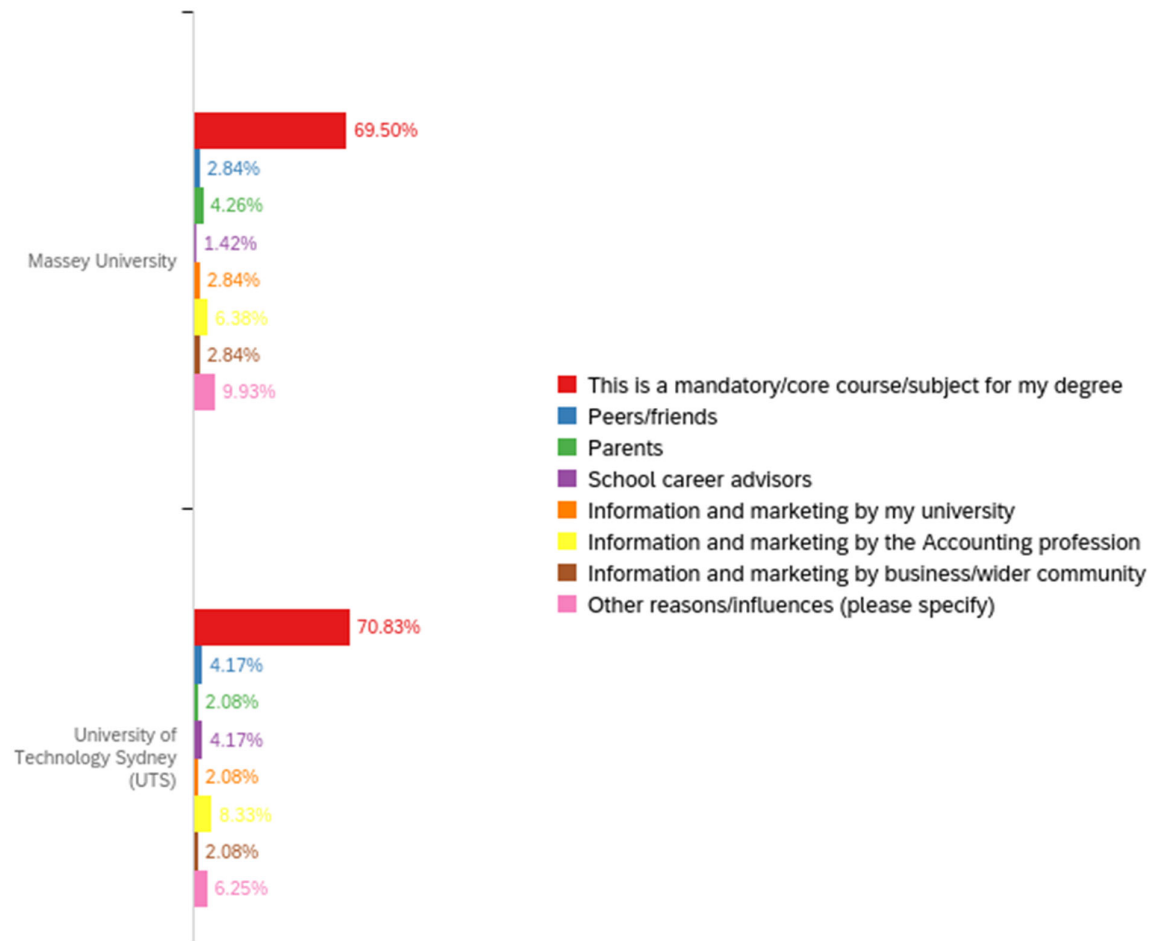


Table 8: Perceptions about auditing as a career

Perception of auditing from career views	New Zealand (Massey University)	Australia (UTS)	Distance	On Campus	Domestic	International
There are good job prospects in auditing	79.28%	75.61%	80%	75%	81%	65%
High remuneration/earnings potential	66.05%	46.35%	63%	58%	62%	55%
Good opportunities for career advancement	77.06%	78.05%	78%	77%	78%	70%
Auditing as a profession has a promising future	68.47%	70.73%	70%	68%	70%	65%
High status of the auditing profession	63.63%	58.54%	65%	58%	63%	60%
High transferability of auditing skills across different businesses and countries	77.06%	90.25%	78%	85%	80%	85%
Technology is going to enhance auditing expertise in the future	82.56%	82.92%	86%	78%	83%	85%
Cost of studying to become an auditor is a worthwhile investment	60.90%	56.10%	63%	55%	62%	70%
There are good migration prospects related to auditing studies/careers	56.36%	60.97%	60%	53%	57%	60%

6.3.3. Personal interest in auditing

In Table 9, we evaluate findings from responses to eight questions regarding university students' personal interest in auditing. We further analyse these responses based on country of study, mode of study, and student type.

The results reveal interesting trends. Approximately 68% of New Zealand students, and notably 83% of Australian students, note that auditing is interesting as a study topic. Also, 68% of distance mode learners (who are predominantly New Zealand university students), note that auditing is interesting, while 78% of on campus students expressing similar sentiments. In comparison, around 70% of both domestic and international students find auditing interesting. These findings are pleasing, indicating that auditing overall is perceived as an interesting area of study by university students.

In terms of students' self-perceived aptitude for auditing, distance mode students rank the highest, with 58% believing they have a strong aptitude for auditing, followed by 56% of Australian students. In contrast, on campus students are least confident about their aptitude for auditing, with only 43% expressing positive sentiments about it. Approximately 50% of both New Zealand and international students' express confidence in their auditing aptitude. This finding is likely to be influenced by the relative youth of on campus students with less exposure to working environments with an auditor or as an auditor prior to or while studying auditing.

Regarding the influence of career advice, only around 8% of New Zealand university students and 17% of Australian university students attribute their interest in auditing to any career advice. However, more international students find such advice influential for their interest in auditing, with 35% responding positively regarding receiving career advice about auditing. These findings indicate that the profession could work more closely with universities career advice services and universities academics who teach auditing courses to provide university students with relevant information that could enable greater encouragement for university students to pursue careers in auditing.

Across all university student groups about 70% of respondents, believe that auditing aligns with their values and beliefs and similarly 70% of students across all groups believe that a career in auditing allows them to impact businesses and society in a positive way. Notably, around 60% of international students express the belief that a career in auditing provides for a meaningful life. This

sentiment is less pronounced among other student groups, of whom only 45-49% share this perspective.

This finding points to the opportunity for the profession to educate students about the value and the contribution that auditing provides in business and society and how pursuing a career in auditing does contribute to the wider context in which auditors live and work.

Table 9: Personal interest in Auditing

Perception of auditing from personal interest views	New Zealand (Massey University)	Australia (UTS)	Distance	On Campus	Domestic	International
Auditing is interesting	67.89%	82.92%	68%	78%	72%	70%
I have a strong aptitude for auditing	50.46%	56.09%	58%	43%	53%	50%
A number of my friends are studying auditing	19.81%	58.54%	17%	51%	25%	65%
I was advised by a career advisor to study auditing	8.41%	17.07%	6%	18%	7%	35%
My parents were in favour of me studying auditing	18.52%	29.27%	19%	25%	18%	45%
The auditing profession aligns with my values and beliefs	70.64%	75.61%	73%	70%	72%	70%
A career in auditing would provide me with an opportunity to influence/impact businesses and society	71.02%	73.17%	68%	77%	72%	65%
Working in auditing is likely to provide meaning and purpose in my life	44.95%	48.78%	47%	45%	44%	60%

6.3.4. Factors influencing further study of auditing at university

In Table 10, we examine the influence upon the choice of further auditing of factors including university students' academic experience, their sense of belonging within the educational community, and their perceptions of career prospects. The results unveil notable patterns across various student groups.

In terms of the overall learning experience, university students across all groups express very positive views on the influence that their learning experience has on their choices of further study in auditing. This includes their personal performance, enjoyment of coursework, the quality of teaching, and the online and on-campus learning experiences. In all of these aspects, their positive perceptions exceed 70%, apart from slightly lower responses by New Zealand university students (64%) and distance mode students (66%), when it comes to the perception of the influence that their own academic performance has on their further study of auditing.

Responses regarding students' sense of belonging within the academic community as an influence on their further study of auditing vary. New Zealand university students exhibit the lowest positive sentiment in this regard, with only around 35% of respondents suggesting that academic community influences their choice of further study of auditing. This is followed by distance mode students at 36%. Conversely, the international student group reports the highest level of 76% of responses regarding the sense of community influencing them to continue studying auditing. Australian university students (76%) and on campus university students (61%) also reflect similar positive sentiments about the importance of their academic community. These results further accentuate the importance for universities and accounting schools to create an inclusive atmosphere that enhances students' experience and fosters a sense of belonging throughout their studies. This is also especially important for attracting international students and on campus students.

Turning to career prospects, around 65% of respondents from all university student groups believe that there is a strong demand for auditors and that this influences their decisions on further study of auditing. Students expressed modest sentiments regarding the influence of financial security in auditing, migration prospects and prospects of a purposeful career in auditing. International students in particular expressed strong positive sentiments in terms of the financial security and migration effects on their desire to further study auditing. These findings suggest that

there are further opportunities for the profession to promote auditing study and career opportunities in auditing to potential new students on the basis of positive perceptions of auditing career prospects.

Table 10: Factors influencing further study of auditing at university

	New Zealand (Massey University)	Australia (UTS)	Distance	On Campus	Domestic	International
Overall course satisfaction	73.78%	89.18%	77%	79%	78%	82%
My academic performance so far in auditing	63.46%	94.60%	66%	80%	71%	82%
Enjoyment of topics covered so far	74.29%	97.30%	78%	84%	80%	88%
Quality of the delivery of topics by lecturers	72.12%	97.30%	76%	82%	78%	88%
Quality of online learning experience	67.62%	83.78%	73%	70%	72%	76%
Quality of the overall learning experience	73.34%	94.59%	76%	84%	78%	88%
Quality of the live on-campus classes	73.08%	87.10%	N/A	80%	80%	88%
Feeling part of a community in my subject/course/degree	35.23%	75.68%	36%	61%	42%	76%
Strong industry demand for auditing graduates	62.27%	64.86%	61%	66%	61%	76%
Financial security offered in auditing roles	59.04%	74.99%	59%	75%	60%	100%
Migration prospects specific to auditing	51.43%	67.57%	50%	64%	52%	82%
The desire for a career with purpose	61.90%	75.00%	62%	71%	64%	88%

6.3.5. Future issues related to auditing profession

In Table 11, we explore issues related to the future of the auditing profession, particularly considering technological advancements and the emergence of artificial intelligence (AI).

Responses regarding the potential replacement of accountants and auditors by new technology and AI yield intriguing insights. International students exhibit concerns about the impact of the emerging technologies on the auditing profession, with approximately 59% believing that technology will depose the need for auditing skills. In contrast, domestic and New Zealand-based university students express the least apprehension about the effects of technology on auditing, with only 27% of them concerned about technology and 22% to 24% of the New Zealand respondents concerned about AI replacing auditors. Australian university students are also not very concerned, with 43% of respondents expressing concerns about technology and the future of auditing and 31% about AI replacing auditors.

Furthermore, approximately 85% of respondents across all university student groups, except for international students at 71%, are of the opinion that there will always be a need for human auditors, mostly as trusted advisors. Likewise, there is a strong belief across all groups of respondents that there will be a need for human auditors and assurance providers. About 90% of New Zealand and Australian respondents share this view. The international students are slightly less positive, at 76%. These findings reflect the overall positive sentiments regarding the future role of human auditing professionals amidst technological advancements. These findings show that students still believe that human auditors will continue to play a role in auditing despite advancements in technology.

6.3.6. Importance of topics in auditing education

In Table 12 university students' perceptions of various topics that, in their opinion, should be integrated and emphasised in auditing courses. The results show that students attach great importance to ethics. Across all student groups, over 80% of respondents express the view that ethics related topics are very important to the auditing profession. However, international students are a slight exception, with only around 65% emphasising the importance of ethics in their coursework.

The next highly ranked topic in auditing courses is technical auditing rules and regulations, with more than 70% of university students from all groups recognising its significance. There are also some positive sentiments around the incorporation of more technology related topics within auditing courses, where most of the university student respondent groups have positive sentiments between 59% to 73% on the value of technology in their auditing course work. Conversely, the results show that auditing students allocate the least emphasis to environmental and climate-related topics for their auditing courses. Across all groups, the responses are between 45% to 58%, indicating that environmental and climate-related topics receive comparatively lower prioritisation. These results reflect the results of the first-year accounting students survey and show that there is a low awareness by auditing students of the importance of environmental and climate-related topics in their studies and future careers. This is possibly due to the failure of university educators to incorporate those topics in auditing courses curricula, thereby failing to open students' perspectives on emerging and important new fields of auditing and assurance. This situation not only provides an opportunity for the auditing profession to inform and educate both university students and university educators on the important developments in environmental and climate related assurance practices but it also provides the profession with an opportunity to inform university students about the contribution that auditors make and are likely to further make to environmental reporting and auditing in the future.

6.3.7. Impact of studying auditing on potential auditing career

Figure 4 illustrates students' responses regarding the likelihood of pursuing a career in auditing, both before and after their exposure to prior auditing coursework at university. The results yield interesting insights, especially when examining Australian and New Zealand university students.

The findings for both Australian and New Zealand students are very promising. Australian university students who were somewhat or extremely likely to choose an auditing career increased from around 41% to 64% after some exposure to auditing studies. Simultaneously, the percentage of students who were somewhat or extremely unlikely to pursue an auditing career declined from 28% to 13%. This suggests that their introduction to auditing studies has positively influenced their interest in auditing for a career.

Similar results are evident for the New Zealand university students, where prior to studying auditing, those who were somewhat or extremely likely to opt for an auditing career increased from 24% to 55%. Meanwhile, the proportion of university students who were somewhat or extremely unlikely to pursue an auditing career reduced from 49% to 25% after being exposed to some auditing coursework. These results underscore the fundamental role of students' experiences with auditing courses in influencing their choices of auditing as a career and ultimately the future of the auditing talent pool. These findings also have implications for university educators to design engaging learning experiences to attract students to the auditing profession.

Table 11: Future issues related to the auditing profession

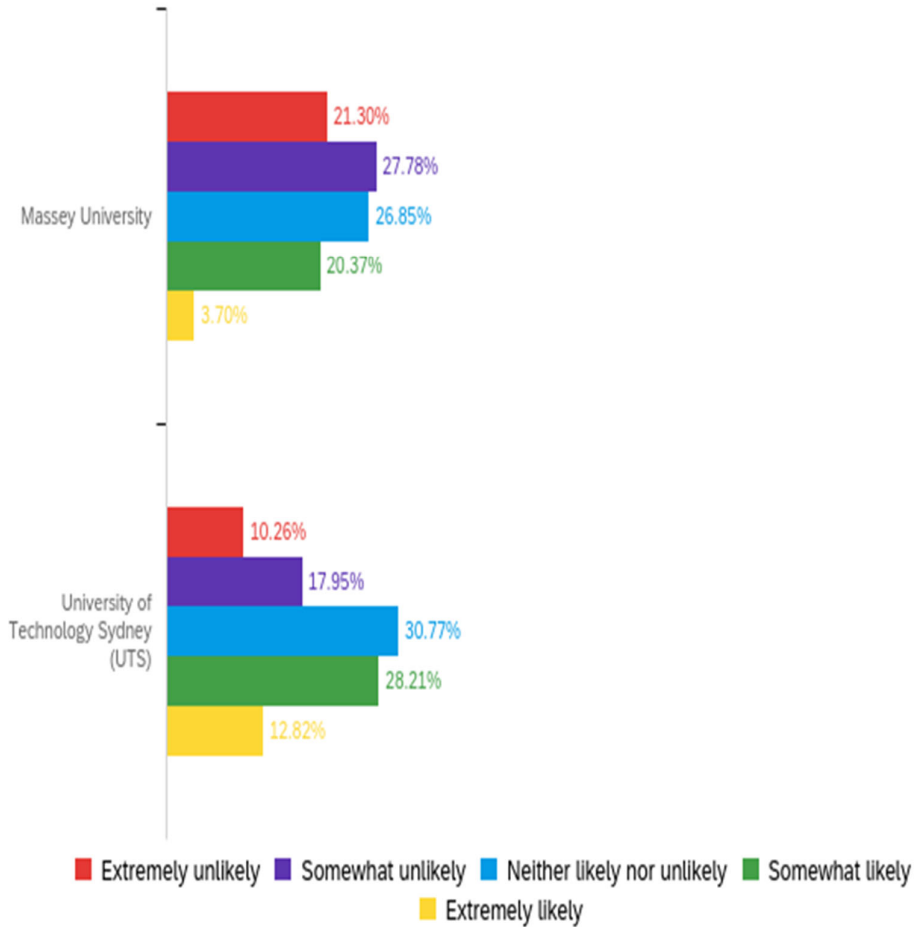
Perceptions on future issues related to auditing	New Zealand (Massey University)	Australia (UTS)	Distance	On Campus	Domestic	International
Advancements in technology and software will replace the need for auditing skills	27.10%	43.24%	30%	34%	27%	59%
Advancements in artificial intelligence (AI) will replace the need for professional judgment by humans	22.43%	30.56%	25%	24%	24%	29%
Human auditors will always have a place as trusted advisors	86.92%	83.78%	86%	86%	88%	71%
There will always be a need for human input to provide audit/assurance information	89.62%	89.19%	90%	89%	91%	76%

Table 12: Importance of topics in auditing education

Future auditing topics importance	New Zealand (Massey University)	Australia (UTS)	Distance	On Campus	Domestic	International
Technical auditing rules and regulations	83.02%	78.38%	85%	77%	83%	71%
Ethics	90.57%	83.79%	93%	82%	93%	65%
Social and corporate responsibility related topics	77.14%	59.46%	79%	62%	74%	65%
Environmental and climate related topics	58.49%	45.95%	56%	54%	57%	47%
Technology related topics	72.64%	59.46%	71%	66%	70%	65%

Figure 4: Impact of studying auditing on potential auditing career

What was your likelihood of pursuing a career in Auditing BEFORE you studied the subject?



What is your likelihood of pursuing a career in Auditing after you have studied, or as you are studying the subject?

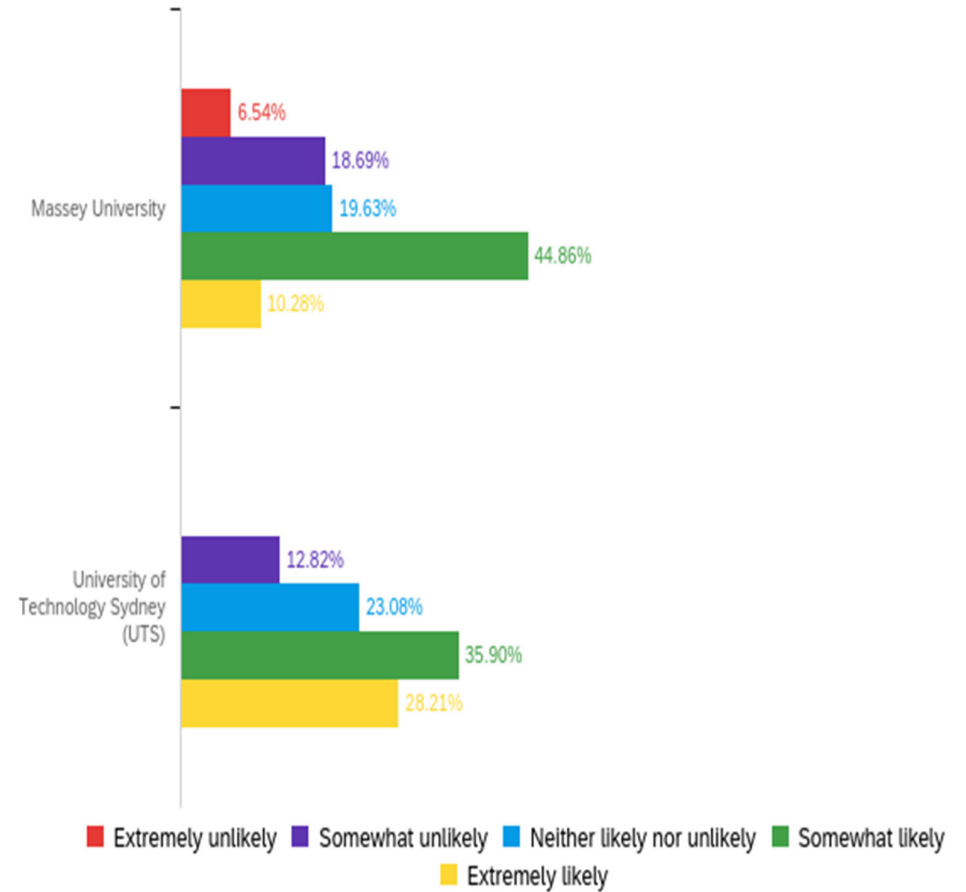


Figure 5 provides additional insights from some open-ended comments made by the surveyed university auditing students regarding their likelihood of pursuing auditing as a career. The larger, bolder words in the word cloud indicate the words most used by students to explain their views. Not all of these are particularly informative, but many do help to highlight themes and sentiments, which reinforce findings in other parts of this report. In summary, while many expressed positive sentiments using words like “love”, “interesting”, “experience” and “opportunity” to describe auditing and why they were likely to further pursue it as a career option; this was tempered by frequent references to “pay” being poor and perceptions of “long hours”.

Overall, our survey provides interesting insights into university students’ motivation for studying accounting and auditing and the potential for encouraging students into further study of both. Our findings suggest an overall positive sentiment about accounting study and particularly the study of auditing amongst our respondents. University students generally chose introductory accounting courses and auditing courses because those courses form compulsory study in their degrees. However, once students have studied auditing, they are more likely to further study auditing and to choose auditing as their career. Important influences on choosing a career in accounting and auditing are those who are closest to a student - family, friends, and peers, and to a lesser extent career advisors. Students studying accounting and auditing seem to value ethics as part of their courses’ curriculum and the technical aspects of their courses. They seem to be less aware, appreciative, or interested in the environmental and climate-related topics as part of their courses. There is an opportunity for the profession to educate university students about the current developments in practice when it comes to environmental and climate-related reporting and assurance. Students also seem to be more motivated on a personal basis by financial incentives and migration incentives when it comes to their accounting and auditing careers. There seems to be an opportunity for the profession to introduce university students to more practical aspects of auditing to assure them about their aptitude and capability to pursue careers in auditing. The university educators also need to pay attention to how their introductory accounting courses are designed and delivered in order to attract and retain accounting students, as “first impressions last” or they seem to make a difference when it comes to students’ further accounting studies. The environment in which students study and interact appears to also influence their study and career choices. A more inclusive and collegial environment is particularly important to international and on-campus students. Therefore, in order to attract and retain students studying accounting and auditing,

universities need to design their offerings with such studying environments in mind. Finally, university students surveyed in our study appear to be positive about the future of the accounting and auditing profession in cooperation with current and future developments in technology and the use of AI in practice.

7. In-depth semi-structured interviews

Interviews were conducted to gather further detail about the perceptions related to accounting and auditing as a career. The interviewed students were recruited through posting announcements on learning management systems and then interviewed either individually or in small groups via Zoom. It is likely that there is a response bias towards students who are interested in careers in accounting/auditing.

7.1. Interviews with undergraduate university students

7.1.1. New Zealand – Massey University

7.1.1.1 Undergraduate introductory auditing

We interviewed four second-year Bachelor of Accountancy students studying introductory auditing. Two were part-time distance mode learning students and two were full-time students at the Manawatu Campus in Palmerston North. Three of these students were female and one was a male student in his early 60s. The male student is managing his own business while the three females are working part-time (one had worked for around 10 years after completing her high school qualifications).

One of the students mentioned that her key motivation for enrolling in an accountancy degree came from career advisor suggestions, while two of the students believed they are good with numbers and hence were attracted towards accounting. The remaining student was uncertain as to what had motivated them. All of these students took their courses as the courses were compulsory in their business study program. Before studying auditing as a subject in their Bachelor of Accountancy, the interviewees' views of accounting and auditing were based on their limited prior exposure to these professions. For example, three of the students considered that both accountants and auditors are focused on the accuracy of numbers, thus requiring strong mathematical skills and standardised processes. The remaining interviewee considered auditors' main role to be concerned with the investigation of client compliance with regulations:

"I thought it would be like super detail oriented looking at just nitty, gritty, tiny things, quite tedious and boring." (Undergraduate student 2)

After studying accounting and auditing, the perceptions of all four interviewees had changed. They viewed the accounting and auditing profession as being more dynamic, encompassing a diverse set of knowledge that extended beyond numbers. Furthermore, all of them had come to realise that auditors must work in teams and interact with people. All four interviewees therefore considered communication as the most important skill for an auditor to have, followed by professional scepticism and critical thinking. Before studying the auditing course, the most important perceived skill mentioned by interviewees were mathematical skills. Some of the interviewees noted that auditors are required to have a diversified skillset, with one explaining that as follows:

“People skills and communication skills because you'll often be working in teams. If you cannot communicate properly and effectively, either with your team or with clients, it will make your job a lot more difficult. Organisation and time management skills are also important because you're working to deadlines. Mathematical skills, analytical skills are required because you have to be able to check details and make sure that things are correct.” (Undergraduate student 1)

Studying auditing appeared to have resulted in positive changes in perception for all four interviewees. One summarised this change as follows:

“When I hit this paper, this semester, I found something very exciting, so yes, I am thinking to join advanced auditing next year.” (Undergraduate student 4)

Three of these students are now keen to pursue an auditing career, while the mature student is inclined to start a consultancy after completing his degree. He believes that his years of business experience together with what he has gained by studying auditing, accounting, and taxation will better equip him to provide consultancy services to small businesses.

The participants considered interaction with new people, having an opportunity to understand different businesses, potential travel opportunities, learning from senior team members, and helping junior auditors as being the key advantages of joining the auditing profession. However, long working hours, the significant investments of time and money required to become professional auditors, poor work life balance, and the threat of legal liability were seen as key disadvantages in an auditing career. One of the interviewees mentioned that recent accounting scandals related to the large auditing firms also create negative perceptions of an auditing career. One interviewee explained her perceptions as follows:

"I think one of the benefits (of) being an auditor is definitely a role that you get a lot of exposure to potentially different entities. It's a very engaging and interesting role from what I can (see) and what I have heard about as you get to work with different groups of people, potentially like different audit teams. And so, it's not the same thing every day, however, one of the downsides can be, though, is that especially in the busy periods, you might do long hours while you're trying to meet deadlines."
(Undergraduate student 1)

None of the interviewees considered the emergence of artificial intelligence and advancement in technology as a serious threat to the auditing profession and were of the view that there will always be a need for human auditors and advisors. However, all of them believed that auditors will be required to use and understand these emerging technological tools:

"I think AI and technology can be tools, but I don't think that they will replace the need for human auditors. And so having a human auditor is still very important."
(Undergraduate student 1)

All four interviewees were of the view that the profession has not been appropriately marketed to potential new entrants and stressed the need for better marketing with a particular focus on marketing to high school leavers.

7.1.1.2 Advanced undergraduate auditing

We interviewed a total of nine third-year Bachelor of Accountancy students studying advanced auditing. Five were interviewed individually and the remaining four formed a focus group and were interviewed as a group. Four of the five individual interviewees were part-time distance learners – two males (in their late twenties) and two females (one in her late forties and one in her early twenties). The remaining individual interviewee was a female Auckland-based international student in her early forties. The focus group interviewees were all Auckland based internal university students - two males and two females, all in their twenties.

Apart from the range of ages, genders, locations, and study modes noted above, interviewee backgrounds as well as work and life experience varied too, adding to the range of perspectives they were able to offer in the interviews. This included four New Zealand residents, one of whom had progressed straight from school to university; foreign students who came from the Cook Islands, China, and Papua New Guinea; some had worked for several years in full-time jobs (accounting,

retail, and construction); some students had maternal and other family responsibilities. Their previous experience/exposure to accounting or auditing, prior to their studies at university, ranged from none to those who were acquainted with auditors or had been exposed to auditors in their work environments.

Only four interviewees cited clear early influences on their choice of accounting as a career: two of these related to family members who were in the accounting profession, while the other two had positive experiences studying accounting at secondary school. The remaining interviewees cited career prospects and described previous work (or internship experiences) which stimulated their interest in accounting (or auditing). In general, all interviewees indicated that their decision to enrol in advanced auditing was driven primarily by the need to satisfy professional (CA or CPA) requirements and thereafter by their preference for the auditing studies (having studied the introductory auditing course).

In regard to their perceptions of the most important topics in auditing courses, four interviewees mentioned ethics during their interviews, one noting:

“Ethics for sure. I have heard a lot about conflicts of interest – being able to understand that.”
(Undergraduate student 5)

There were also two interviewees who valued the more applied aspects of advanced auditing. One explained this as follows:

“The majority of the delivered topics are important- the advanced auditing course is practically oriented – I value that in the course. I would appreciate more real-world cases and interactions with practitioners”. (Undergraduate student 6)

The other interviewee felt that the specifics of applying the concepts studied to each of the transaction cycles was giving her *“... a better understanding of auditing as a whole.”* No particularly important topics sprang to mind for the focus group interviewees, but when prompted as to whether any topics were particularly off-putting, two of the interviewees noted that the case law relating to auditors’ liability raised concerns for them.

When discussing whether their perceptions of auditing had changed pre- and post-studying auditing, most interviewees noted considerable changes of perception, e.g.,

“Auditing is so much more than what I originally thought. It is dealing with people and transactions, internal controls. I realised how much study goes into an audit.” (Undergraduate student 7)

A strong theme that emerged during the discussion within the focus group was on how much they had learned through their internships and how much these had influenced three of them towards auditing as a career choice. However, another three interviewees noted that there was little likelihood of them pursuing auditing as a career, for various reasons. One interviewee effectively expressed their, and another interviewees', perspective as follows: *“No. It’s not about the career in auditing, it is more about my personal choice and preference. Now I am pursuing a job until my retirement, something with less competition, steady and less stressful, not in a big firm, maybe in a smaller practice or a corporate.” (Undergraduate student 8)*

The perceived advantages of an auditing career in auditing were well summarised by this quote from third year auditing university student:

“You get exposure to a lot of businesses so much breadth of experience rather than where you’re just in an office or just a little cubicle getting out there talking to people You’ve just got more exposure.” (Undergraduate student 9)

Another student interviewee added that this would spill over to a networking advantage as well, especially early in one’s career. He saw Auditing as an excellent foundation to any career – the exposure provides opportunities to, *“... see where you want to go ...”*. The interviewees also noted that the shortage of auditing professionals was well known, which meant the demand for auditors was a benefit – if you apply there is a good chance of getting a job.

The interviewed undergraduate students also noted perceived disadvantages centred around working hours and low pay:

“I think it is just the reputation that you are going to be working 60-hour weeks or longer... I think that is a deterrent for a lot of people.” (Undergraduate student 11)

They went on to comment on their understanding that starting salaries were low and that new graduates generally had to live frugally to make ends meet. Another interviewed student added insight by explaining that although he was more than prepared to work hard, he did feel that work-

life balance was important. He pointed out too that there were other careers/roles that seemed more attractive - he noted that he had a lot of friends who were switching into data analytics.

"... the money is really good, the hours are really good ..." (Undergraduate student 10)

Communication and people skills were seen by most interviewees as being especially important:

"Need to be good at communicating, earning peoples' trust, willing to learn new things, good analytical skills and good teamwork." (Undergraduate student 5)

The interviewees who had experienced internships also highlighted how important they found technical skills to be. Interviewees began by noting, *"Microsoft Excel ... a lot of what we did (during internship) was on Excel"* (Undergraduate student 11). They went on to describe how they were taught at the beginning of their internship (the first week was all training) how to use functions like 'VLookUp'. They emphasised how much of a difference this made to the work they did during the rest of their internship and to their efficiency and the ease with which they were able to perform the tasks required. This interviewee added that they had also found it necessary to develop and improve their email skills. They went on to elaborate that this involved learning to communicate more concisely and to break long paragraphs into more easily digestible chunks so to convey the meaning more effectively. After an interjection by another interviewed student about communication skills, they added, *" ... it's a whole culture of 'you learn from each other' ... and I don't ask questions often because I feel like I'm bugging someone ..."* (Undergraduate student 11). They elaborated that, while they were encouraged to try to problem solve for themselves, they were also encouraged to ask for help rather than spend too long trying to solve a problem alone. The culture in firms emphasised that as graduates move through their careers, they should always be learning from those above them, while being prepared to do the same training of those less experienced than them. Interviewees also strongly agreed with these sentiments having had similar experiences. Interviewees also added, *"Power BI as well ..."*. They described how, at the beginning of their internship too, they were introduced to the main tools used when conducting audits – Excel and Power BI being among the most important.

None of the interviewees felt that technology or advances in artificial intelligence (AI) should be viewed as a threat to the auditing profession. The general sentiments are well captured with this quote:

“I think it’s a friend not a threat ... you’ve just got to be open to adapting.”
(Undergraduate student 11)

Some useful suggestions came from concluding the interviews, especially about the importance of reaching high school students earlier and more effectively about the opportunities in auditing as a career choice. The interviewed students recommended that the profession could highlight how interesting and varied a career in auditing is, and tie this to accounting as the language of business, as well as

“Emphasise that accounting is not all just about bookkeeping and that nowadays accounting packages take care of most of the tedious bookkeeping tasks.”
(Undergraduate student 12)

7.1.2. Australia – University of Technology Sydney

We interviewed a focus group of two undergraduate students studying the auditing course/subject at UTS as part of their accounting major in the Bachelor of Business. It was difficult to obtain focus group participants within the UTS student population. Both students interviewed had secured internships in auditing for the 2023/24 summer period with a Big 4 accounting firm and were currently studying auditing. The focus group participants were both male and enrolled in their studies full time, but were from very different backgrounds, with one student not knowing anyone who worked within the accounting and finance profession (Undergraduate student 14), and the other knowing multiple family members and friends who worked in the profession (Undergraduate student 15).

The exposure via family to various business careers highlighted accounting as a career path that provided a broad range of opportunities, *“not only could you go into big business, but you can also do small business kind of stuff, so I knew accounting was very versatile”* (Undergraduate student 15). Natural talent also influenced the choice to major in accounting, *“everyone else found*

accounting really hard, and I'm like wait, what? No this is really easy and that's kind of when I made the decision" (Undergraduate student 14).

In terms of seeking out professional experience, both students chose auditing for an internship because it was the field they felt they knew the most about in Big 4 firm services – not having a strong understanding of what risk advisory or tax rolls might entail. Interviewee 2 suggested that having short courses available to understand what various types of accounting careers might involve would be highly beneficial (which coincides with the recent new strategy announced by Chartered Accountants Australia and New Zealand to partner with Year 13's [Academy program](#) to provide this type of experience). Undergraduate student 14 recognised that it was easier to get into an auditing internship than other services internships and that any type of experience was better than none.

When discussing auditing as a future career, neither student wanted to stay in audit for the entirety of their career – acknowledging audit as a steppingstone to other roles. They acknowledged that an entry-level role initially may involve repetition, but as you become more senior, you would have greater responsibilities related to directing the audit, rather than just following instructions. Undergraduate student 15 acknowledged that auditing would be *"really long work hours, low pay, but it does give me a necessary set of tools and the opportunity to complete my CA"*. Both students mentioned that they had compared salaries of graduates in auditing of approximately \$65,000 to other graduate positions in finance of \$70 to \$80,000. Undergraduate student 15 stated *"the first graduate salary is not so important as what I'm going to be getting in five years"*. Undergraduate student 14 stated that the lower salary in audit would be exchanged for experience and a higher salary when you leave the audit firm at the manager or higher level. Both students acknowledged that living at home with their families meant that it was easier in the future to accept a graduate role with lower pay, but with the ultimate goal of moving out of home in Sydney, salary is important, *"that little bit of extra money that you have in your pocket really does count down the track"* (Undergraduate student 14).

When asked about what skills they thought were needed for careers in accounting – neither student discussed technical accounting skills – instead focusing on professional skills such as professional scepticism, communication and interpersonal skills and the ability to be self-directed in your work on an audit engagement, that is, not just following instructions but really understanding the client to understand what might be incorrect in their accounting.

As previously stated, the university education experiences of students were an important factor in both students' selecting auditing for their internship and graduate pathway (supporting the evidence from the survey of auditing students), and it was the quality of that experience that drew both students into pursuing further auditing studies and internships. *"It's done really well; it is made engaging. You go through questions and make mistakes, but you see where those come from and encourages you to think, 'Yeah, I can do this'"* (Undergraduate student 14). Auditing at UTS is taught by Dr Jin Sug Yang, in a model of student learning and engagement developed by Associate Professor Amanda White and recognised in 2020 with a Citation for Outstanding Contribution to Student Learning by the Australian Awards for University Teaching. The program utilises team-based learning in large format classes that are co-taught by a university academic and an industry professional.

In the discussion around their educational experiences in other accounting subjects, both students mentioned that they found the teaching of accounting standards using long lectures as dry, preferring shorter pre-recorded videos with interactive elements to help students check their knowledge. The quality of the tutors was also highly variable in their experiences and a good or bad tutor can make or break their educational experience. They shared very different experiences in the same subject, with one tutor teaching in a style that had students highly engaged, while the other was seen to be reading from the material and not that enthusiastic about the topic at all. The student with the highly engaged tutor said that most students came to class every single week, while the student with the tutor who focused on reading from notes lost most students by week eight (of a 12-week semester). This evidence has implications for academia – specifically heads of departments and unit/subject coordinators. There is a need for highly trained and engaging educators who are willing to bring experienced professionals into the classroom to show students what a career in audit might entail.

What was highlighted as lacking in students' educational experiences was exposure to the career options in accounting and information on professional certification programs, *"I didn't know anything about the CA program or what benefits it would have for my career"*, stated Undergraduate student 14.

7.2. Interviews with graduates/professional qualification programs candidates training to qualify as chartered accountants or certified practicing accountants

We interviewed 16 accounting graduates who are working professionals and currently undergoing their professional qualification programs and training so to qualify as chartered accountants or certified practicing accountants. Of the 16 interviewed candidates, nine are currently working in auditing (either internal or external auditing) as a professional service line. The remaining seven of these professionals are working in other service lines such as insolvency, business advisory and valuation. Some are in the mining industry, public sector or education and one is self-employed. Eight interviewed graduates and professionals work for Big 4 or second-tier accounting firms. Eight of these interviewees are female and eight are male. 10 of these interviewees are living and working in Australia (three in NSW, five in Victoria, one in WA and one in Queensland) while the remaining six of these interviewees are living and working in New Zealand. All of the interviewed graduates and professionals have at least two to three years of experience working in business and accounting, and one has over 15 years of experience. Most of these interviewees are in their twenties while one is approaching 50 years of age. All of these interviewees are self-selected. After a call for participation in this study interviews were sent to all Professional Programs candidates, 16 of such candidates expressed interest in being interviewed. All candidates that expressed interest were interviewed and we present here the findings of those interviews.

The interviewed graduates and professionals did not generally think that there is a lack of talent in accounting profession. They consider that there are talented accountants in practice but probably not recognised or trained adequately. Some of the interviewees also pointed out that, from their point of view, it is a matter of expectations that employers have about their employees:

“I don’t think there is lack of talent – Asian students are very competent.” (GRAD 2)

“There is enough talent around.” (GRAD 3)

“That was the case, but I think not so much now. There has been a lot of promotion of the industry.” (GRAD 4)

“Thinking the opposite – there is a lot of talent out there but perhaps the accounting profession is failing to capture it”. (GRAD 5)

“I see a lot of talented people. If in general people saw accounting as a whole profession where you get a lot of skills, they would be attracted into accounting.” (GRAD 7)

“There is a lot of talent, but I think that employers do not take enough time to develop their staff. There is the expectation that they will be good in their role right from the start – that is the issue for the employers.” (GRAD 9)

“I think accounting has the same problems as other professions – graduates not having context and practical reality. It’s about the lack of immersion. Young accountants don’t know how to solve problems. So, possibly it is not a lack of talent it is more about the lack of opportunity for immersion into practice while you study.” (GRAD 13)

“Only in some ways it is true. I think other industries have better opportunities. I think talent in accounting can be underutilised.” (GRAD 16)

When asked what the reasons for the perceived lack of talent in the profession might be, the interviewees pointed out that the level of remuneration and the work-life balance might be some of the deterrents for attracting more talent into the profession:

“Number one driver for the lack of talent is money but also status – accountants are not highly regarded.” “There is also the impact of long hours – the firms work in archaic structures – there needs to be more flexible arrangements.” “The only people who will remember your late nights and overtime are your kids.” (GRAD 1)

“Work-life balance and money.” “Working in accounting requires a lot of hard work and a lot of the time.” (GRAD 4)

“Low pay, particularly in the first 36 months. The ‘work hard, stick it out and you will get rewarded’ [mentality] is not working anymore. Culture is also a barrier – particularly glorifying overwork.” (GRAD 5)

“The pay – it is lower than in other professions. Plus, the long hours and not being paid overtime. I went into public practice and had to sacrifice my pay to become a CA.” (GRAD 14)

In terms of the responsibilities for attracting talent into the profession, the interviewees consider that the professional bodies, government and particularly educators all have a role to play:

“Australian Government – they should think about the immigration. Give more opportunities to international students – we love Australia. And the industry – [we] have to work really hard, big workload – that needs to change.” (GRAD 3)

“Equally educators, government and professional bodies.” (GRAD 4)

“Everyone plays a role. In education the focus should be on projects and soft skills, so to develop the talent.” (GRAD 16)

The interviewees expressed the criticism of their university education that it is too theoretical, assessment oriented, not practical enough and not adequately preparing graduates for their working life. The graduates emphasised the need for educators to liaise with the industry and employers to bring practice into teaching at universities.

“At university there should be more presentations and group work – a lot of the time graduates are not prepared for the profession and the work ahead of them. There should also be some introduction to speaking diplomatically, behaving professionally, not being late – your professionalism can make you or break you.” (GRAD 5)

“Educators should provide opportunities for work-based learning and more practical examples in the curriculum.” (GRAD 6)

“Professional bodies have a huge impact on how you see your role – the possibilities and how the profession is within the wider setting. There should be more power given to the professional bodies. Without a professional designation I would not be a good professional. There should also be a collaboration between educators, the professional bodies and Government.” (GRAD 7)

“Attracting talent is everyone’s responsibility – the universities should set up opportunities for students, to talk and see what working life is like. Firms should provide good working environments. And regulatory bodies should make things less bad for all.”

“Universities should spend more time talking to firms about what their graduates need to know and what they should be able to do (including equipping them with non-technical skills). Firms should remember that people are their biggest assets – making sure that everyone learns and that there is a good environment.” (GRAD 8)

“Educators definitely have a role to play. It is not all just about exams. There needs to be more of practitioners’ input into the uni study. The key message to the universities is that there should be a change in the approach to teaching – there should be more case studies and scenarios used.” “There should be a mix between the professional bodies and universities to promote the accounting profession. But also, employers should be talking to students about what the career in accounting is about.” (GRAD 9)

“More discussions should be between universities and employers.” “To make accounting more attractive, start emphasising that it is a good start and that you can move into industry and get paid better. There needs to be a change in the perception, remuneration and working conditions.” “A lot of the stuff you get from the firms is glamourised – it is not what is happening. It is not genuine; it is mostly damage control.” “Actually, something needs to change – the approach needs to change - everyone is talking about it, but nothing is changing.” (GRAD 12)

“Students are lacking immersion – it is too theoretical at uni.” “Business education has become a cash cow.” “Universities need to put more emphasises on practical and meaningful education, make practical part of the study.” “The professional bodies need to lobby to demonstrate [the] value of accounting. A professional designation is a point of differentiation and CEOs and CFOs can endorse it – more allies in prominent executive positions. We need to show the broad view of accounting and finance.” “We need to go back to nuts and bolts and also talk about sustainability of organisations”. “The message should be – accounting is a platform for other pathways.” (GRAD 13)

“I don’t think that graduates are equipped well with required skills at university. There is a lot of emphasis on marks and not enough on real business world and what a real business world is about. I wish that at university I was equipped with real world examples and skills such as reading financial statements and learning how to read tax and law. I think that practical sessions need to be used more at university.” (GRAD 14)

“I think the responsibility is with the industry, the firms. But also, the professional bodies. They should not only police the profession but understand it and work with the accounting firms. Government should also help the professional bodies and treat the professional programs as funded postgraduate studies.” (GRAD 14)

“I think accounting can be viewed as a toolbox – language to learn – we need to sell those skills. I think the accounting profession does not sell itself enough. And everyone is responsible and should be on board. Industry based learning would be good. While working gives you knowledge, academia does not. It doesn’t represent real business. University educators need to capture people early, and younger (in year 11 and 12). It is about perception. Accounting is practical. We also need to tell university students that auditing is never a final destination. Also, partners need to be involved and care for their staff, for their succession planning, proper learning and making staff feel that they make a difference.” (GRAD 15)

The sentiment about deficiencies in tertiary education as preparation for practice and working life was sustained in the discussion about the required skills for working in accounting and auditing.

Most interviewees stated that analytical skills but also soft skills around communication are required in accountancy:

“Keep learning, be curious, use IT skills – that is important for the career.” (GRAD 3)

“Analytical skills, ethics in business, communication, but [you] also need to be good with numbers. Should not stop learning stuff.” (GRAD 4)

“Largely soft skills – communication (with clients and within the firm), be accountable, be professional and own what you do. Be resilient.” (GRAD 5)

“Being able to talk to clients; communication skills and interpersonal connections. This isn’t taught at uni. Writing skills and analytical skills are also very important.” (GRAD 12)

Soft skills are perceived as particularly relevant for working in auditing, especially skills for communicating with clients but also for managing work and stress and knowledge of ethics. It appears that graduates and professionals are well aware of the pressures of working life and what it takes to have a successful career in accounting and auditing. The following quotes illustrate interviewees’ perceptions regarding skills that auditors need:

“Integrity”. (GRAD 3)

“Being able to build client relationships. Every day is different, so you need to be a jack of all trades and a master of all. You need to be able to look at the whole picture. The breath of work is huge.” (GRAD 6)

“Time management, people skills, team membership, problem identification and attention to detail but also being able to see a big picture.” (GRAD 8)

“Soft skills are very important, such as being able to speak to a client, engagement with clients, it is important to understand financial statements and understand the risks.” (GRAD 9)

“Managing stress well, being efficient is important.” (GRAD 10)

“Soft skills, being able to influence with your messages, being able to write with influence [and to] write influential and snappy messages.” (GRAD 13)

“Communication skills are important, needing to communicate with different parties. Time management is important and technical skills you build up as you go. The rest of the skills come as you work.” (GRAD 14)

The interviewees were particularly critical of their tertiary education for not preparing them well for the professional life and work. They talked about the disconnect between the education and practice and how universities need to equip students with better technical skills, soft skills and understanding of the practical world of accounting and auditing:

“I was not that well prepared for work by my education – what is important in the work is top level networking, winning jobs, the social aspect that is hard to foster and soft skills as well as technical skills. There seems to be a disconnect between teaching and what students really need”. (GRAD 1)

“Communication, especially small talk is important in accounting. Confidence is also important and being outgoing.” “What I learnt has nothing to do directly with what I do here. Real learning started when I started work.” (GRAD 2)

“I was not prepared well. Had to self-study. Education could not give me everything. Language is important, ability to communicate.” (GRAD 3)

“You have to be good with numbers and logic. Excel skills are critical for the accounting career. Starting the work, I didn’t think I had the skills – there was massive learning on the job.” (GRAD 6)

“University does not teach you a lot of technical stuff, but it is enough, I think. The university should equip you to be prepared, organised, group work and to have a global picture.” (GRAD 8)

“Education/uni did not equip me with the skills [required]. Using accounting standards was minimal at uni. It was not practical enough. There needs to be more practical learning.” (GRAD 9)

“Courses that prepared me well are not even courses in accounting. The accounting courses are not practical enough. What would help in the education is to, for example, audit a set of financials – a practical case, case studies and work experience.” (GRAD 10)

“What you learn at uni is different from what you learn at work. A lot of stuff at uni is about manufacturing and not reflecting what the real world is really like.” (GRAD 12)

“Technical skills are important but more so soft skills – communication, time management and client management. It is also good to pick up new skills all the time. I developed those skills more after uni. The focus at uni was on grades while in reality getting on with people is important.” (GRAD 16)

The interviews also addressed the interviewees personal choices and plans, especially in reference to choosing or continuing a career in auditing. When asked what attracted them personally into the accounting profession and what the major influences were on their career choices, the interviewees mostly expressed their early liking of accounting and business at high school and that they had support, encouragement and role models amongst their family and friends. It also appears that besides aptitude for accounting, the exposure to good teachers of business studies and accounting at a high school level had significant impact on later career choices when it came to choosing accounting as a career path:

“Always liked accounting – the analytical side of it.” (GRAD 4)

“I worked part time from age 15 in my parents’ accounting practice.” (GRAD 7)

“I always wanted to be an accountant, even at school.” (GRAD 8)

“I always loved numbers but didn’t want to be a maths teacher. I always wanted to be a Chartered Accountant.” (GRAD 10)

“I always enjoyed business and accounting.” (GRAD 12)

“It was a practical decision in year 12 at school – I knew it as a solid career.” (GRAD 13)

“There was strong family influence”. (GRAD 1)

“Family – dad was an accountant, that is why I chose commerce studies.” (GRAD 4)

“Friend’s sister who was a manager in a Big 4 - such a professional woman. She influenced me”. (GRAD 5)

“My dad has been in finance, and I always wanted to work with money. I always wanted to work in a profession that pays well.” (GRAD 8)

“A lot of my relatives are CAs. I also liked accounting in school. That made a difference in my choices, otherwise I would have chosen economics.” (GRAD 9)

“At school I was introduced to commerce and commercial banking. The cadetship opportunity was a bit of an accident, but it worked. It was hard doing study and working. The firm was supportive of the study and the current firm is supportive of the CA Program.” (GRAD 12)

“My grandfather was an accountant and my uncle as well. There is a strong family influence.” (GRAD 14)

“My family. Both of my parents were also auditors and so was my godfather.” (GRAD 15)

“I had good teachers in year 11 and 12. They inspired me to study accounting.” (GRAD 16)

The majority of interviewed graduates and professionals are aware of the main advantages and benefits of having a career in the auditing profession. They consider that a career in auditing offers many opportunities, from training to exposures to variety of businesses and experiences as well as opportunities for networking.

“In audit everyone is trying to help you and make you better – that’s a good thing”. (GRAD 1)

“It is good for your career to be in audit. With Big 4 there is a clear promotion process, at least until manager level. There is good training in different industries.” (GRAD 2)

“You become far more focused as a person, become able to multitask and become a more effective person and more confident.” (GRAD 5)

“There is a good exposure to different businesses in audit.” (GRAD 8)

“There are a lot of opportunities. As an accountant and as an auditor you have a lot of impact on businesses – a critical part from the financial point of view.” (GRAD 9)

“If you have a background in audit, you are sought after in commercial roles.” (GRAD 12)

“Auditing career is great for meeting people and gaining confidence. Internal audit is a great space to be and has grown. Audit keeps your options open. Internal audit felt to me more dynamic and interesting. You are always learning, and firms are looking for staff both internal and external.” “There was however stigma at uni about external auditing – the story is that if you get to be an auditor you can’t get into anything else.” (GRAD 13)

“Audit gives a good opportunity to learn, train and branch out.” (GRAD 14)

However, not many interviewees were planning to further specialise in auditing or had decided to stay in auditing long-term. Interviewed graduates and professionals offered several reasons for this, although most centred around long working hours and the lack of appropriate

remuneration. In general terms there is a sentiment amongst the graduates and professionals that a career is important, but that it needs to be balanced with the rest of a professional's life.

"I have a lot of friends in audit – it is a transitional space – a lot of people are not staying in audit mainly because of the work-life balance. Audit is interesting but they do long hours." "The profession has a long history but to move it forward, it needs to move from the still archaic framework – you don't have to work and die working." "I want a career that supplements my lifestyle. Update the field into the 21st century." (GRAD 1)

"Paid overtime in the profession and in audit would make a difference." (GRAD 1)

"Audit is not an easy field unless you want to work very hard. I hear that work is really tough compared to other specialities." (GRAD 4)

"I was unsure what to choose and what to do. Auditing seemed like a standard choice/job after uni. I think it gives you a good start in a career. I started in a mid-tier firm and that was a lot of pressure. I was put into a senior position very early and my salary was better than the average in the industry. However, long hours were a main reason for me to leave external auditing. My current employer is not so good with supporting the professional qualifying program, not like public practice firms are." (GRAD 9)

"I started working in audit because it was what was on offer. There were not many jobs in accounting in my region and the firm I am working for now is an international firm." (GRAD 10)

"I have heard about audit – not good things. Long hours, issues with clients and the pay is not that good. They (the audit firms) have got a bad rap. Hours are bad and bonuses are capped so they are not the reflection of worked hours. I think employers use and abuse auditors." (GRAD 12)

"I am staying in accounting but will probably go into management accounting or be a commercial analyst. I don't see myself in auditing in a long term (not for another 20-30 years). Deadlines in auditing are too much. You have to think about the work outside of work – especially with external auditing – it is too much." (GRAD 9)

"I am not interested in auditing. I like business planning. Audit requires a lot of experience. I have also heard a lot of not very good things about audit – mainly around work-life balance, not having clear expectations plus that audit firms don't have enough staff. Plus, there a lot of scandals in the media. So, I would like to specialise in business advisory." (GRAD 7)

“It’s the working hours and the tight timeframes. If a client is well organised, then it all works well. I will not stay in audit long term – not with the hours I am doing right now.” (GRAD 14)

“There are difficulties with the volume of work and working conditions. It is hard to get a few weeks off. Working hours are long while the pay is pretty medium. There could be payback in terms of other benefits and those these are not too great at the moment. The problem with assurance is that there is a promise of so much but then it is not all true.” (GRAD 15)

“I heard that they do long hours in audit. I think it could also become mundane and easy to get stuck where you are, unless you have a good manager/employer. For me, audit is not interesting, not at this stage.” (GRAD 16)

In contrast to perspectives regarding auditing, most interviewees do plan to stay in the accounting profession long-term, although some express reservation about public practice. A number of interviewed graduates and professionals are exploring possibilities in different roles in the wider industry:

“Not many people want to stay in public practice for a long time – there is a lot of money but also a lot of stress. It’s Ok for medium term.” “I don’t have a partner aspiration, but it is good to work where I work for getting good skills, knowledge, and networks. I will be looking for better opportunities with better hours somewhere else.” (GRAD 1)

“I am staying in accounting for a long time”. (GRAD 2)

“Yes, I am planning to stay in accounting for the long term.” (GRAD 4)

“I am staying in accounting but probably not in audit – it is not the most fulfilling work; it is hard work (a lot of sacrifices) – I want better working hours.” (GRAD 5)

“There is not a lot of recognition in accounting. Perception is a big thing, particularly for audit. I am looking to move more into finance in the long term. Accounting is monotonous.” (GRAD 6)

“I am looking to stay and potentially in the next 3-5 years to go on a secondment in UK. That will influence my decisions.” (GRAD 8)

“I will probably stay in auditing. I don’t want to start from zero somewhere else. There are more opportunities in audit. Yes, I will stay in accounting for my whole career.” (GRAD 10)

"I want to stay but will probably go into a finance role. I don't want to do basic accounting anymore; I want to do something with economics." (GRAD 12)

"I might go back to banking and finance after gaining my CA." (GRAD 14)

"I will stay in accounting and probably work in tax. I am in a good team now." (GRAD 16)

When asked who has a responsibility to encourage graduates and professionals into the auditing profession and what should that encouragement entail, most of the interviewees suggest that auditing firms have an important role to play but so do university educators and professional bodies. Suggested actions range from ensuring better communication about the advantages of a career in auditing to better pay and working conditions for auditors and better liaison between university educators and practitioners to inform students about the real work in practice.

"From the university education perspective I think there is not much more that can be done for the auditing profession. Firms should be doing more". (GRAD 1)

"To attract into the profession the juniors should be paid better and there needs to be a good sell of the good parts of the audit – the exposure to businesses and personal growth that you get in auditing. You come out as "a fillet mignon", in the end." (GRAD 5)

"Management of the firms need to talk to graduates and juniors (we love to see a woman – role models). CAANZ and CPA have a big role to play – currently they are acting as intermediaries – they should talk about what it is to work and study and explain what the demands of the professional qualifying program can be. Messages for all involved: Firms – pay overtime, Government – do something about student loans, University educators – push your students hard enough and tell them about the auditing practice while they are studying." (GRAD 5)

"I think that university educators need to let students know what auditors do and what are the benefits of an audit career in the long run, that it is a great career start. Firms can sometimes overpromise and then it does not all add up. Perhaps there could be more diversity of people with other backgrounds and pathways into the profession. Professional bodies – find the way to help students without reliance on their employers. Universities should really incorporate practical aspects in their teaching. In conclusion – the old systems have to change – do things differently." (GRAD 14)

"Firms – there should be more flexibility in firms' cultures. People would buy into the hours if they saw more opportunities in developing themselves." (GRAD 15)

Finally, we solicited responses from the graduates and professionals about the future of the accounting and auditing profession and the effects of technology, automation, and AI on the future of work. In general terms the interviewees consider technology and AI as having positive effects on the profession and they are optimistic about the role of accountants and auditors in the future, alongside the developments in technology, stressing that there will always be a place for a human person (accountant and/or auditor) in the future of business.

“AI will be a supplementary tool, it will make work quicker, however there are still some concerns about information sensitivity and confidentiality.” (GRAD 1)

“AI is going to be important - using machine learning – companies could gain from that in the future.” (GRAD 3)

“Auditing is attractive – if you stay in the audit, market values you – values auditors, so it provides for good opportunities. Even with AI, I think there will always be a place/job for us auditors.” (GRAD 6)

“AI might change things, the type of work we do and what kind of processes we use – it will be good for analysis. But there will always be a need for people with skills.” (GRAD 8)

“AI will be influential. It will assist in day-to-day jobs. However, we are currently discouraged from using ChatGPT in our firm for privacy of data reasons.” (GRAD 9)

“AI is good, it might be helpful, but I think there will always be a need for people to operate it.” (GRAD 10)

“AI can be a challenge but also can be a blessing – it can shorten the process and outsourcing can take out the boring work, then focus can be on advisory services.” (GRAD 12)

“Automation/AI will have an impact on audit but there will still be a role for people to play in the future of business.” (GRAD 14)

“In the future technology could be a threat as some of our services could be reduced. But it also could be helpful for automating such things as bookkeeping. Overall, I don’t think we will be fully relying on technology or that we will be completely replaced there will always be a need for people.” (GRAD 16)

Overall, our interviews of graduates and professionals undertaking professional qualifying studies present a slightly less positive picture when it comes to the impressions and intentions to stay long-term in an auditing career. The interviewees in this group do understand the benefits of starting a career in auditing. However, due to perceived working conditions, largely centred on long working hours, and perceived lower remuneration than in other service lines or professions, these interviewed graduates and professionals are not willing to commit to developing a long-term career in auditing. Nonetheless, most graduates and professionals are happy to continue a career in business or another line of accounting services apart from auditing. These graduates and professionals also recognise the importance of communication skills in their work and careers.

The graduates and professionals are particularly critical of their tertiary studies when it comes to their studies preparing them for their working careers. That is because they consider that university education that they received has not been anchored in examples of real-world practice and therefore they suggest that university educators need to work closer with the industry and the accounting and auditing practitioners to equip graduates with appropriate knowledge, skills, and insights of what a working life and a career in accounting and auditing is. This implies a greater level of work-integrated learning and possible partnerships between the universities and the accounting profession. The graduates and professionals interviewed in this study also consider that all – university educators, professional bodies, and employers, even government have a role to play in attracting talent into the accounting and auditing profession.

7.3. Interviews with employers

We have interviewed representatives from eight New Zealand and two Australian employers. The interviewees ranged from representatives of Big4 accounting/audit firms (labelled as Partners 1 to 4 Big4), mid-size firms (Partners 5, 6 and 7), small regional auditing firms (Partners 8 and 9) and a public sector auditor (Partner 10). Five interviewees were male and five were female, all held the rank of audit/assurance partners. All of the interviewees have a minimum of 20 years of experience in accounting and auditing and are leaders of auditing practices which they represent. They are all very committed to the long-term sustainability of the auditing profession.

7.3.1. The talent pipeline

It was agreed by all employer interviewees that there is currently a lack of talent in the auditing profession pipeline and that they faced significant difficulties in attracting such talent. The lack of talent is evident in both the lower number of applicants for auditing graduate positions as well as the quality of the applicants. There has also been a decline in domestic students applying for audit graduate positions and an increase in applications by international students. Comments from employer interviewees demonstrate the seriousness of the issue:

“Yes, I think it's both. It's quality. Volume is quantity, but also quality.” (Partner 2 Big4)

“We were hearing about talent 7 to 10 years ago and now we haven't the sort of people we would like to hire, we struggle to fill the positions with the sort of people that we would want to be employing. So yeah, we used to have a real fight for positions, we could all pick up many people who were great and, you know, could have filled the repositions three times over.” “Whereas now often first time we do a recruiting round, we don't fill the positions because we just don't see the right quality of people. We have to go out to market again and again.” “That's our experience.” (Partner 3 Big4)

“Yes – we have seen the graduate recruitment numbers drop off significantly over the last 2-3 years in terms of the number of applicants and the quality of the applicants. Globally all but a few countries report a shortage of auditors, and this is having an impact on our ability to import talent.” (Partner 6 mid-tier)

“It was only 2 years ago that we actually opened up our applications to non-residents and to non-domestic applicants. Whilst we did see an increase year on year of applicants, domestic applications are down year on year across all disciplines and non-resident applications are up.” (Partner 7 mid-tier)

“I have witnessed how things changed – everything went online, especially since COVID. There is a shift in how work is now – working from home, remotely, flexibility but audit has always been deadline driven. Flexibility is not so much of an option in auditing.” “There is a challenge to attract talent now.” “There are fewer people wanting a career in accounting. It starts at high schools. Not many at high schools know what accounting all is about – there is a lack of knowledge at the grass root level.” “We used to be picky, now we are not in that position.” (Partner 8 small practice)

“We have seen reduction in talent pool – in size but also in calibre. We used to take on 35-40 graduates and 14-15 interns. COVID with borders closed and restrictions in tertiary has impacted accounting and auditors – shortage is obvious in NZ and Australia”. (Partner 10 small practice)

“I wouldn’t say it’s a lack of talent, but being able to attract that talent, so flipping it on its head, and making sure that the firm is attractive to the candidate. We’ve missed out on some good candidates – it might have been the perception more than reality, or how we actually sell ourselves to graduates”. (Partner 9 small practice)

The interviewees also describe the lack of talent manifesting in various ways, from an increased turnover of staff at junior levels, apparent lack of resilience by new staff and graduates in the working environment, through serious constraints in conducting and completing audit engagements due to the lack of staffing and restricted capacity, potentially also leading to the reduction in audit quality:

“Absolutely. And the other thing around quality is, I don't know if you can say turnover is quality, but certainly turnover at junior levels is much higher than it's ever been historically, whether that's quality or not, I'm not sure. But we do see, you know, I'm sure, that all firms have plans in place when people aren't developing as they should. We do call them our own names, but the number of plans that we would have in place to develop people at a junior level have significantly increased compared to previous years.”

“You know, they, the graduates, kind of go off and do something else. But we seem to have a lot more plans in place for those people that don't seem to be achieving what we expect.” “That tells me that quality is certainly not as good as it used to be.” (Partner 1 Big4)

“My perspective on the quality thing is that it is aligned with what the others have said, but also there's a resilience element to it. And I think that's why we see a bit of attrition in the earlier years than we used to.” “So, it used to be quite rare to see graduates or people in their second-year sort of opting out, but we see more of that of through COVID, post COVID and I've kind of put that back to resilience. And you know when the going gets tough, they're not as prepared to sort of knuckle down and work their way through it potentially. And look, the quality, I guess is in the attributes of the people that are coming through, they are still broadly pretty good, but I'm not sure that they either ever “failed” before or did so until they get to us. That is, they have been top of the class through high school and then being successful at university and all of that sort of stuff. And then suddenly get into the work environment and things don't quite pan out perfectly, or they're not as in control of their own destiny as perhaps they used to be.

And those factors kind of feed into that resilience point and often the answer is just to quit.” (Partner 4 Big4)

“The other thing I would say on the quality piece and maybe the way I tend to articulate it, which is just one view, it's like having a bucket full of graduate applications and we used to just take the cream off the top like skimming cream off milk, the cream off the top and it was excellent. Now there is just no cream anymore and you have to go down into the sort of the bottom of the bucket to get your graduates. So, you're not getting the same calibre who are applying and then there is also not enough of them. So, it sort of becomes quite a multi-faceted issue. And where are all those people going? There are just a lot more other attractive things for them to do. You know, we've all got big consulting businesses now, ‘the corporate finance’ of this world; the banks have got bigger graduate programs than they used to. There is lots of other places for graduates to go. And so that's probably a bit of a factor too, more degrees, more different, interesting things that just weren't there 30 years ago.” (Partner 2 Bi 4)

“I was just going to comment on your resilience point, and I totally agree, because our statistics show that our people are working less than they were. So our numbers by individual are going down, yet the comment is that people feel they are working too much. If anything, the graduates think it's worse, so I totally agree with that resilience piece.” (Partner 1 Big 4)

“We have to work harder to get people that we are comfortable with in our firm.”

“People are also much more transient – not so much on a career path.” (Partner 5 mid-tier)

“Significant capacity constraints in our business.” (Partner 6 mid-tier)

“Up until COVID, the general turnover was 25% from graduate up to senior associate, which was not too bad – but we had people that were starting the profession in an environment that was completely remote during COVID. They missed a whole learning opportunity and the collaboration and on the job training, which I felt left a bit of a gap. Audit has the lowest acceptance rate [of graduate job offers] compared to any other of our disciplines. Management consulting, risk consulting has a higher area of interest and higher acceptance rate amongst graduates – however most of the roles available are within the audit and assurance division.” (Partner 7 mid-tier)

“There is fast turnaround, we are struggling to keep staff. A lot of them say early on “this is not for me; it is not what I thought it will be”.” (Partner 8 small practice)

“There is a shortage in auditing but also shortage in accounting profession in general. Auditing practices have been hit hard. Employers are going to great lengths to attract

talent now. For our work one of the manifestations of the lack of talent is that we had to manage the audit delivery with extensions on statutory audits. We also had to spread the workload amongst the service providers. Private firms make choices which firms to audit and which not so now FMC reporting entities are having to go to Australian auditors. We are not prioritising completions of audits.” (Partner 10 public sector)

7.3.2. The impact of the pipeline on the industry in the longer term

The effect of the lack of talent is particularly concerning for the audit practitioners in the long-term in terms of audit quality and the ability to undertake any additional audit and assurance work, potentially leading to difficulties in the supply in the audit markets as well as the reduced trust into the financial markets and the financial information that enables financial markets to operate. The difficulties in increasing audit fees are also proposed as one of the consequences of the lack of talent in the audit profession. The following quotes illustrate these concerns:

“Because it's not just an auditing profession issue. This then becomes the CFO issue. Who are going to be the CFOs of the future? The finance professionals of the future? You know that's where a lot of them come from, audit profession. And so, it's got far wider implications than just being a capital markets issue in terms of not being able to get audits done, it's going to become a far wider problem.” (Partner 2 Big4)

“There is a long-term effect on audit quality. There is less quality at the lower level which leads to pressure on managers and partners. Ultimately there are pressures also on audit fees.” (Partner 5 mid-tier)

“This is going to lead to the constraint on our ability to accept new work. We are actively identifying clients in our client base who are lower margin clients so to exit their work/audits. This creates opportunities for smaller firms to pick up this work however this is at a time when many smaller firms are reducing their audit businesses due to difficulties in meeting regulator prescribed quality and compliance standards. Many smaller businesses will find it increasingly difficult to find an auditor willing to accept their audit.” (Partner 6 mid-tier)

“There are fewer people entering the profession – that will impact understanding of what we are trying to achieve in the auditing profession”. (Partner 8 small practice)

“The ultimate long-term effect is the reduced trust and confidence. That is the risk for public”. (Partner 10 public sector)

7.3.3. What do audit partners believe is driving the talent shortage?

The employer interviewees proposed that there are a number of reasons for the current lack of talent in the auditing profession and suggest that the decline in talent is a result of the decline in the number of students choosing to study accounting. They also propose that there is a need to better communicate about the accounting and the auditing profession and that the responsibility for that rests with employers but also with professional bodies and the university educators:

“When I entered the profession, it was an accolade to be a CA, it was a professional accreditation that would take you global if you wanted to be able to work overseas and work in a diverse area of discipline – to be able to elevate you to a C-suite role. Over the years, I feel the prestige is not as high as what it used to be. There is a lot of marketing about what it means to be a CA and the opportunities available to you... but I think also, the world of accounting has changed, it’s not really about the numbers anymore – it is intertwined with other disciplines like data analytics. It’s a lot about leadership, soft skills, and relationships – the client experience and how you interact with them day to day.” (Partner 7 mid-tier)

“It’s multifaceted. As these things always are, but I think that the root cause is the lack of numbers coming through the tertiary system. You know, with the drop off in numbers because that leads to, my bucket analogy.” “Maybe, it’s all of the options that are available for people coming out of high schools these days that the accounting degree is not attractive now as it was attractive in the past, as it used to be.” (Partner 4 Big 4)

“There is something we are not doing right to attract the right people into studying accounting and into our profession. We should look into rebranding our profession.” “We have been so focused on internal processes, compliance and regulators – we have forgotten to properly market ourselves.” (Partner 5 mid-tier)

“There are reduced volumes of accounting specific graduates from our universities and this trend will continue. In addition, there is a continuing trend amongst young people not to commit to the 3–4-year time periods with one firm to achieve their professional qualifications. They either complete their professional experience using multiple employers or never complete it at all.” (Partner 6 mid-tier)

“We had so much turnover and the lack of talent coming through the pipeline, it is making for long term issues when you think about the partnership model. We had a bullish plan to intake our graduate intake as much as possible, but attrition is higher than it was before. There is so much that is more important to this generation than money – community, sustainability, doing the right thing, mental health....” (Partner 7 mid-tier)

“The major reason is the talent pipeline – majors in accounting. It has been lower in the last 5-6 years and that was also caused by the changes in the high school curriculum. There is a reduced understanding of what accounting and auditing is.” (Partner 10 public sector)

“Education we can tweak the most – auditing is a great profession – we just need to promote it.” “Professional bodies – we need to promote the opportunities – that auditing is great for understanding businesses, getting insights and understanding various facets of organisations – a lot of that knowledge can be taken to other parts of one’s life.” “We need to promote how flexible that knowledge and experience is and that you don’t have to be pigeonholed the whole career.” (Partner 8 small practice)

7.3.4. What the profession needs to do to attract and retain talent

The interviewed employers are also looking at possible ways of attracting talent into the profession and into their firms, considering how to best articulate the messages around auditing as a good career. They clearly see educators (both at the secondary and tertiary levels) as important influencers on students’ career choices, both in terms of the quality of the curriculum and teaching and the advice provided to students. The interviewed employers also see that the information about the accounting and auditing profession needs to be disseminated early, in high schools, and that the interest in the profession should be initiated at that level with assistance by professional bodies. The employers also consider that the current narrow focus on accounting graduates is not sustainable for the profession and that there should be a wider and more flexible approach to entering the accounting and auditing profession:

“We have to widen ‘the funnel’ for new people. Non relevant degrees and school leavers, all of that. We need to have a pathway for them into the profession. Look, ultimately if the professional bodies don’t play ball, you know our brands are all strong enough that we’ll go our own way. So, we need to be thinking about that when we work with the professional bodies which we are currently doing.” “We can also develop our own programs. We could hire non relevant degrees and back our own training programs.” (Partner 4 Big4)

“I think we also need many players to understand the purpose behind what an audit is and what it does so to give it a purposeful work angle, because you know, a lot of the younger people that I certainly see and engage with, they’re very much driven by that purpose. That is what is a bit different now really. Now they (the graduates) think about

things very differently. Or maybe they consciously think about things differently and therefore will be attracted to do things for different reasons than maybe we were. So somehow, we need to better articulate why auditing. What is the value? Why would you want to be an auditor? What is the purpose behind it?" (Partner 2 Big4)

"Certainly the suggestions we've had is that accounting in general is sort of talked down a little bit by careers advisors. You know, it's all going to be replaced with AI in 15 years or five years or whatever - people think so. So, I think there's just some silly rhetoric out there that potentially gets students not thinking about auditing as a valuable career early on." (Partner 3 Big4)

"And there is a role for educators, way down at the at the high school level." "To be honest, if you plant a seed with someone at that stage that this (auditing) isn't a viable career, this (auditing) isn't something you want to do, then somebody saying something different at the university level may not be relevant because they have already made up their mind. There is a massive education piece for those people (students) to understand." (Partner 1 Big4)

"You need the professional bodies to be able to deliver alternate pathways for people (students), pathways that have more flexibility in them and that's one of the conversations we've been having with both CPA and with CAANZ. So that students could come in, like from the UK system, with non-relevant degrees or could use some of the training that they get within the firms to go towards with their professional qualification rather than expecting a large chunk of their degree to have to be done, doing the right papers which then limits their options to study other things. So, I think its multiple people that need to be involved in the supply chain. Clearly also us. Unfortunately, there's no simple answer." (Partner 2 Big4)

"All of us have a role to play: membership/professional bodies, industry in NZ, government. Our membership/professional bodies should be active in this space." "The employers should also do more with high schools and career advisors." (Partner 5 mid-tier)

"We need to build partnerships and bring the profession to life, like engineering. Engineering has systemically been a male dominated discipline. There are very few women that decide to do engineering at university, that it's just male only profession, and I know there's a lot of work that's been done at the STEM level, and at the grassroots, like in high schools. There must be an element of an education piece through high schools as well for so for adolescents and teenagers to have an awareness. Our firm does not do anything with high schools – in terms of to actually come out and talk to them." (Partner 7 mid-tier)

“I think it needs to start in the high school curriculum – there should be teaching of financial literacy and accounting studies in schools.” “Also employing from schools and to do study while working.” “There should be easier ways into the profession – bridging papers to become a professional accountant – currently the path is off-putting. We find that business degree students are often the best auditors – we need alternative routes for them.” “If we get earlier in the education process, we will capture more people – at high schools. Provide them with the opportunities to see what a great career in accounting and auditing can be – that would encourage more people into industry.”
(Partner 8 small practice)

Once staff are attracted into the profession, retaining staff is also important, with employer interviewees reporting in previous statements that turnover is higher than ever – evident with employees unwilling to “stick it out” for three to five years, as was the norm in the past. The firms are taking different approaches to retain talent:

“Way to make audit more appealing is through people wellbeing and changing workforce offerings. There are different mind sets by young people and employers need to lift their game too. Audit is always about deadlines, deadline driven- but that should not come before people wellbeing.” (Partner 10 public sector)

“We are using our international networks to promote interest in participating in secondment programs. We are also using offshoring to add additional capacity into our teams.” (Partner 6 mid-tier)

“The firm has to be able to sell itself as a great place to work, good culture, diversity in terms of clients and the team opportunities for the future, in terms of career progression. Adoption of good technologies to make work-life balance more balanced and flexible working arrangements. It’s all things we do well but it’s a matter of being able to sell it... as soon as they start on the first day, making sure they are looked after, they’re engaged, they’re not just left to their own devices, and they are enjoying what they are doing.”
(Partner 9 small practice)

“To retain talent, we focus a lot on our culture and what our values mean as a firm and a lot on career development as well. Some of the things we have done over the mentorship is improvement in terms of how we mentor our people from when they start as a graduate, to progression through to director and partner. We find out what is important to our graduates, and actually tell them this is not just a job, this career can actually have a lot of opportunities that are important to you as a human being. Focusing on our community and our values.” (Partner 7 mid-tier)

7.3.5. What partners perceive the tertiary education sector can do

Audit partners that we interviewed believe that the lack of talent in the profession is also affected by potential applicants/upcoming graduates lack of appropriate skills. Generally, the skills that are missing are around technical skills in terms of understanding the practical side of accounting and auditing but also soft skills in terms of communication and ability to work. The employers attribute some of the lack of required skills to the disruptions in education that COVID-19 caused but some have deeper, probably generational difference cause. Employers perceive that university educators have a role to play when it comes to preparing the graduates for their career paths:

“The tertiaries don’t equip graduates with the right skills – not around technical skills, the students are not challenged enough.” (Partner 5 mid-tier)

“Practical elements are missing in education.” (Partner 8 small practice)

“That’s a very hard thing to put your finger on. Exactly what it is, I could offer some thoughts. I think sometimes you don’t necessarily get the all-rounders, so those who have done other things, you can get a lot of people who have studied and got amazing marks, but they can’t communicate with you. So, communication skills are really important and being able to get on with people, having done something else so that you’re not narrow in your abilities.” (Partner 2 Big4)

“I do think it is that resilience piece more than anything because I would argue, give me anybody you know, regardless of what degree they have, if they’re ambitious and they’re open to learning and they are, keen to do well, all of that kind of stuff will carry them through regardless.” (Partner 2 Big4)

“And as I mentioned before, we get people that have done an accounting degree and/or have done all their accounting papers and come into the firm, and we still spend a day trying to remind them what it is to do a journal entry because the skill that they get throughout university, from a practical point of view, isn’t always as we need it. So, I would argue that we don’t actually expect people to have a huge amount of knowledge coming out of university, with those types of things we will train them in all of that.” “So, it’s all about that resilience piece and yeah, whether that’s COVID-19, whether that’s generational, whether that’s something else I’m not entirely sure what to point to and say: “Well, that’s what’s changed, which is why it seems harder for people to work in audit.” (Partner 1 Big4)

“There was a massive disruption through COVID-19 that was across all of the supply chains in our world. You know, with the borders being closed and we rely massively on supplementing our workforce from that area (internationally) and when it was turned

off, it just created pressure everywhere. And so, there's no doubt people had to work harder through that period, and that would have impacted a lot of our young people as well. You've probably seen it through the university system as well, but my perception is that it's massively disrupted the way people learn on campus versus at home. Same happened at schools. We have year groups that kind of got forgotten at schools because the schools had to focus on doing their exams. So, some of those kids are now coming into the start of university and they have largely studied at home.” (Partner 4 Big4)

“I think the interesting thing though is that the situation was probably just accelerated it, because we already had this problem with talent before we had COVID-19. We were already struggling to get graduates numbers to get the quality graduates, but particularly in the traditional areas of our business, such as audit.” “Exciting, flashy service lines seem to have no problems getting people. It's more the auditing. Tax to a lesser extent, but they still aren't necessarily getting everybody they want as well. So, I think it's not just necessarily audit per se – it is our profession in general – the traditional services.” (Partner 2 Big4)

“There is a knowledge gap – what they (graduates) learn and what they need, especially around the depth and volume of audit testing”. “There is also a lack of problem-solving skills with newer employees”. “I think there is also too much hand holding – we encourage them to try to work out what is wrong – we use a buddy system.” (Partner 8 small practice)

“I still think it is obvious to have a good grounding in terms of accounting – I feel like it is still pretty much the same in terms of subjects (compared to when I was at university). But maybe having a bit more do to around electives that are futuristic in terms of what the profession will look like in five years' time. Research skills, report writing skills, or even just general communication – the ability to communicate. Those are the things that you see are lacking or that needs development in the grads where you're most definitely mentoring them in learning how to be self-directed rather than giving them solutions. Communication skills is a big one, especially with the generation where they are used to – just typing in text. You'll see them in the office, and they'll be texting/messaging each other on Teams.” (Partner 9 small practice)

7.3.6. The skills and attributes needed in auditors

Interviewed employers particularly seek and value IT skills but also soft skills, such as aptitude to learn, resilience and communication skills. In general terms employers would like university

educators to be more cognisant of how accounting and auditing practice works and to educate graduates accordingly:

“Auditing is becoming more dependent upon IT skills, analytical skills, learning new technologies – modern graduates should possess good skills in these areas.” (Partner 6 mid-tier)

“Being curious and ability to change are important. Being resilient (the way that you are with the client – making connections) but also be sceptical and independent. Clients might not like what they hear but you need to be able to handle that conflict, be able to speak up and challenge.” (Partner 5 mid-tier)

“Critical are general aptitude and the level of intelligence, good engagement and communication skills and problem solving. Critical thinking is important and the right attitude (wanting to contribute). When the talent pool is smaller variability of skills is even more pronounced – the problem-solving skills are now lower. The average level of skills has now dropped.” “We expect some basic fundamentals – being able to think and write. We are seeing graduates not being work ready (talent pool is lower on average). “What to do better? Prepare graduates so that they are work ready – that they are not lacking in general communication skills, critical thinking skills and being able to engage, question and challenge (enquiring mind). In terms of technical skills – we are expecting that graduate understand debits and credits and spreadsheeting skills (we are seeing less of those) – these are critical for graduates to be work ready. I thin across the lecturer or university educator population there is a lack of knowledge of how things are in practice – that is important.” (Partner 10 public sector)

“The biggest struggle that I have is around a core skill that I think people are unaware of when they choose the profession is project management and communication – that is: how do you interact with people? Emotional intelligence. A large part of our work is to be able to deliver quality, is asking questions in the right way. How do you demonstrate professional scepticism? Challenge management appropriately? It's the biggest thing lacking in our graduate intake, and we understand that sometimes it is hard to teach those skills. I don't necessarily think you can teach them at the university level, but having an awareness that if you are to go into this profession you need to develop those skills.” (Partner 7 mid-tier)

“It's really finding an individual that can have good research skills, and I suppose we need to talk about Chat GPT. Like prompting skills, knowing what to ask, how to ask it, and get the information they need in a shorter period of time... In terms of their analytical skills – they have to be able to look at a problem, come up with a solution and then be able to communicate that really well – having a different mindset. When they find

themselves in a 'pickle', skills to get themselves out of that rather than asking for a solution. They need a 'can-do' attitude to get out there, engage with the client and be real. Put the time in to get the rewards." (Partner 9 small practice)

Employers are also aware that, in spite of an auditing career providing a very good basis in understanding business and developing transferable skills for entering many other accountancy specialisations and roles, there are a number of reasons why graduates and young CAs are not choosing auditing as their long-term career option.

The passion of employers for the auditing profession and what they believe it offers graduates is clearly seen from these quotes:

"Audit is a brilliant way to understand how businesses work. All different types of businesses from sort of the ground up. And in your role as you progress through you get access to quite senior executives and board members, which other professional advisors, often don't get." (Partner 4 Big4)

"Variety is incredible. You know, just the number of different businesses you get to interact with and see as is the personal side of thing. So is the number of people that you'd get connections with is incredible." (Partner 3 Big4)

"Obviously, the training. The training and the skills you're acquire, problem solving and communication report writing. You also learn how to tell your message simply, how to deal with really tough situations and there's so much that you learn. I often say this. Even at a partner level, the audit partners are the only ones who regularly sit around board tables. I interact with the CEOs and the directors. And that window of opportunity is amazing because I can attend these meetings, which I could not do if I were not an audit partner. How many board meetings or board tables I've sat around in my career is massive, far more than any director would do so. It is actually a very privileged career, and you get, you know you get involved in all types of other things as well. It's not just about the technical delivery of an audit, but you can get involved in recruitment. So, you can get your interviewing skills involved in other thought leadership. Also, doing research, there are just many, many aspects to the auditor role." (Partner 2 Big4)

"And in many ways, the fact that our people are so attractive to corporates is sort of the proof of the value of it to corporates. They know the value of an audit trained person and that's why they target them and go after them. So, in some ways it's a bit of a compliment. And maybe that's the story that needs to be told right through the supply chain, to the schools and throughout the education. Audit is about early training in the career and then ultimately, you know, gives many options that you have once

you get to the end of that training period. It's as much about the universities as it is about the schools. We all sort of got to be aligned to tell that positive story.” (Partner 4 Big4)

“Security, opportunities, and wide variety of entities you work with, learning about business and working with like-minded people.” “There are opportunities to grow your career in various teams, to travel the world, go to a lot of interesting places.” (Partner 5 mid-tier)

Employers are considering several reasons for the current lack of attractiveness of the accounting and the auditing professions, generally proposing that the messaging around the accounting and auditing needs to change and that the profession itself needs to communicate better about the purpose and the benefits of auditing in general but also about the benefits of a career in auditing:

“I think part of it is actually just semantics and language to a degree. The way we talk about the industry can have a massive impact. What is your job as an auditor? How would you describe it? How do you talk about it as the output, as the purpose, how do you talk about it in that way? Because I think as long as we continue to just go along with the negative rhetoric, it's just not going to do us any favours. And I think we all need to change across the board around how we talk about audit.” (Partner 1 Big4)

“People don't understand how diverse and foundational basic accounting is as a skill for all business – it is sold as a skill that is being disrupted and replaced by AI.” (Partner 6 mid-tier)

“There is a lack of attractiveness due to the perception challenges and structural challenges. There is also a lack of quality in career guidance at high schools and also by professional bodies. In schools there are more choices available especially when it comes to science and engineering.” (Partner 10 public sector)

“People coming from the profession are often seen as boring or mundane, doing the same thing day in, day out, crunching numbers. The younger generation just doesn't see that as a future – they might say accounting is going to be dead in the future and that might be what's being portrayed to them.” (Partner 9 small practice)

The employers are also concerned about their sense of a generational change, realising that communication about the benefits of a career in auditing needs to be better. They are, however, finding it difficult to understand the changing world and motivations of newer generations of graduates:

"I think you just get some who decide it's not for them. So, I think there's a bit of that resilience piece. There's probably lacking in some graduates. And we used to always get a few of those, but you get a lot more now in spite of actually probably working hours are less than what they used to be, and the working conditions are better. So, it's an interesting situation." (Partner 2 Big4)

"Some sort of change through the generations or the number of changes you are expecting in the profession over time. You know, when we joined it was very common that people would stick in the same job for long time. One profession, for life, and that just isn't now people's expectation. Now, whether or not it would suit them (graduates) or not is irrelevant. It's just there is an expectation that they need to go out and do different things to sort of have a fulfilling career and a fulfilling life. So, I think there are a lot of people, whether they're enjoying their current job or not, that just feel like there's something else they are able to go and experience or must experience." (Partner 3 Big4)

"That's true. I had that with a really talented must be near manager in a fifth year. Recently, well, a couple of months ago he talked to somebody else and thought he should apply for a job somewhere else, and then he clearly got offered the job. And then I started talking to him: "Do you really want to do that? I don't know, but maybe I want to give it a go because I'm not sure". Cutting a very long story short, end of that day - he said to me, I actually decided I'm going to stay in audit now. So, it's, I do think that a bit of peer pressure has got a bit to do with it all or what they (graduates) see others doing and what they don't necessarily feel like they do. We/employers aren't very good at understanding it, to be fair. We probably don't really articulate the value of those first three years as an auditor, the learning they get, the training they get, the opportunities they get, how many businesses they meet, different people they meet, look and experience at different industries - there's no other career that gives them that, but we don't really emphasise that. I don't think we market that particularly well or articulate it very well and it's only when they make it through to maybe year 4-5, that they suddenly realise - 'Oh my gosh, I've got all of this experience. So, I am so well set up now for whatever I want to do.' But you just got to somehow, get them to get past those first few years. Yeah, you know the sort of where it gets a bit tough to see past those difficulties and to see that actually if I can stick with it, it's going to be far better for me in the long term." (Partner 2 Big4)

"Yeah, the fear of missing out, isn't it? I think if you want to describe those comments, it's just wanting to try that other thing just in case." (Partner 4 Big4)

"And I think people are leaving. You've got the people leaving earlier than what we expect, and for those people, I think, it is a combination of factors. When we joined, well you always stayed and did your first three years because why would you go through all

that effort and not stay those three years and get professionally qualified? It just seems absolutely crazy to us that you would put that much effort in and then quit near the finish line, whereas they (graduates) don't seem to see it that way anymore.” “They don't seem to think that they are quitting before the finish line, so I think there's that aspect of it. There's a FOMO. They think: ‘There's this and then these are other things I should do’. They don't see it as the concept of staying and getting the qualification under your belt - that doesn't seem to have the same appeal as it did previously.” (Partner 1 Big4)

“Clearly what we are offering now is not enough – job security does not come into it right now. We have also not shaken off the “boring” tag.” (Partner 5 mid-tier)

“They believe accounting as a discipline is being replaced by other disruptive technologies or industries. This is not even well understood by teachers in high schools, career advisors.” (Partner 6 mid-tier)

“I think it's a shift in generally, how people think about what work means to them, and it may not just be just audit. It's other jobs as well. I'm sure all industries are facing this, but they (graduates) genuinely don't want the stress and they don't want their time taken away from them.” (Partner 7 mid-tier)

“Our profession is highly regulated. We are constantly scrutinised. I think that is important for the reputation of the profession.” “Not knowing what auditing entails and the reputation of accounting is what contributes to the bad perceptions and this situation. Other factors are the salary levels, long road to professional designation compared to some other jobs. Young people are looking at the least amount of training for the highest pay.” (Partner 8 small practice)

“Auditing has been viewed as a great starting point in a career. When one qualifies that broadens the horizons. Now we are seeing people looking for certain experiences and if they don't get them, they move on – they don't wait to be qualified. They make those calls earlier. They look for more attractive and appealing jobs.” (Partner 10 public sector)

“When we're interviewing potential grads, they tend to interview us, rather than the other way around. We have to really sell the firm – flexible working arrangements, culture, expectations, diversity in terms of work.” (Partner 9 small practice)

7.3.7. The elephant in the room – remuneration

In the current economic climate, some interviewed partners recognise that discussing remuneration for auditing graduates is an important issue.

“I don't know if the profession can pay as well as private enterprises, and we're competing with private firms or government. There is a lot of pressure on

remuneration. We don't make super profits. I think it was a 10% profit bottom line last year. That's a combination of investing in people, paying above average, not making it all about profit. These guys also want to be CEOs after 12 months, but have you actually got the life skills and experience? The ability to manage people? They are accountants by trade, but they are not people managers. One of our graduates took a job at a university in relationship management for \$90,000 – we just can't compete with that, especially if you live in Sydney.” (Partner 9 small practice)

“It's the perception that I don't want to kill myself for a job that is only paying me a certain range when I can do less hours in a role and have less stress, for the same, if not more, money. They think that it's not worth it – not worth my stress, my mental health, not seeing my friends and not having a life. When it comes to salary – it's an interesting question, because students will jump at a chance for an investment banking job that makes them work 60 to 80 hours a week for a ridiculous amount of money. Is that part of the equation that audit firms can change in terms of salaries? How much can you pay someone locally? And when you have the added mix of outsourcing, technology efficiency – it's a delicate balance of how you can sustainably run a model in a professional services firm.” (Partner 7 mid-tier)

For context, salary information from Glassdoor.com.au for graduates in Australia for a variety of business careers as well as other professions are as follows: accounting/auditing - \$63,500, finance - \$70,000, marketing - \$63,000, law - \$77,000, engineer - \$70,000 to \$80,000, teaching/education - \$85,000 (in NSW).

7.3.8. Summary of employer interviews

Overall, the interviews with employers reveal a real concern for the perceived lack of talent in the accounting and auditing profession. The current situation, in the eyes of the employers, has long term implications for the quality of audits, capacity to provide audit and assurance services and is potentially having a long-term effect on capital markets and public trust. The reasons for the lack of talent are perceived by employers to be the lower number of business/commerce and accounting graduates and their inability to attract them into the auditing profession due to higher salaries in other related accountancy fields (e.g. commercial accounting, finance and consulting) and negative perceptions of auditing due to the workload/working hours, remuneration and work life balance. In the eyes of employers, the graduates who are attracted to the profession appear to be lacking appropriate skills, particularly some soft skills and certain attributes such as resilience and long-term commitment to their careers. The responsibility for attracting talent into the profession is seen as

attributable to all: the employers, professional bodies and university and high school educators. Particular responsibility is attributed to the professional bodies for communicating with and educating potential entrants into the profession about the benefits of a career in accounting and auditing early in the education process. Employers are also sensing a generational change in terms of attitudes and commitment to long-term careers in accounting and auditing amongst the new graduates. However, they were not sure how to address these changes within the current business models.

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