Research messages 2010

National Centre for Vocational Education Research

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Highlights for 2010

Georgina Atkinson, Francesca Beddie

The two main themes at NCVER’s 19th annual ‘No Frills’ conference reflected the preoccupations of an expanding tertiary education and training sector in 2010: how to promote equity and how to bring out the best of vocational education and training (VET) in the changing education landscape.

In terms of equity, the message coming from the research is that to help people get the best out of their training, institutions should ensure that the learning process does not make it more difficult for those who are already struggling with disadvantage. And in terms of VET’s place in the world of education, practitioners and researchers alike were encouraged to be proactive in asserting VET’s position in the new tertiary education and training system. This would include ensuring a strong vocational identity for VET teachers and the communities of practice that sustain them; deep links with industry in developing and delivering training; and the significant progress already made within the VET sector towards equity in education. These themes were reiterated throughout the research published in 2010.

To stimulate thinking about the current VET reforms and how they can shape a bright future for vocational education, NCVER commissioned essays from several prominent people in the VET community. These were published in The future for VET: a medley of views with an introduction by Robin Ryan who drew together the major points from these essays. Ryan concluded we need a new settlement to address federal governance of vocational education and, over time, improve funding mechanisms.

An important part of developing an effective VET system that responds to skill demands and training needs is building the capability of VET providers and the VET workforce. In Building capability in vocational education and training providers: the TAFE cut, Hugh Guthrie and Berwyn Clayton argue that TAFE providers need greater control over managing human resources to best meet their strategic business needs. This includes addressing constraints posed by industrial relations and giving more attention and resources to work design and workforce development of teaching staff. In another paper, A short history of initial VET teacher training, Guthrie contends that the current—and very basic—regulatory approach of the Certificate IV in Training and Assessment as the mandated qualification for VET teachers and trainers is not adequate. He suggests that a broader range of qualifications needs to be accepted, which would enable practitioners to address a wider range of factors, including the nature of their teaching roles, provider profile and the characteristics/needs of students. There should also be a more rigorous regulatory application of requirements for staff to maintain and develop their teaching skills. Vocational education and training workforce data 2008: a compendium, edited by Guthrie, shows it is difficult to get accurate information on the VET workforce, and that little is known about the career paths of VET staff, and the qualifications they hold. In Practitioner expectations and experiences with the Certificate IV in Training and Assessment (TAA40104), Clayton and colleagues provide some insightful commentary from graduates of the Certificate IV in Training and Assessment. They conclude that, when taught well, the certificate provides some if not all of the essential skills required of new practitioners.

As raised at ‘No Frills’, and in The future of VET, there is a feeling of change in the VET sector. The increasingly blurred boundaries between vocational education and training and higher education, as well as regulatory reforms stretching and pulling providers in new directions, have become of significant interest to researchers. 2010 saw the release of Gavin Moodie’s issues paper Mixed-sector tertiary education: implications for self-accrediting and other higher education institutions. The paper presents an initial account of mixed-sector tertiary education in Australia, with the intention of provoking discussion and informing his further research on the increasing blur between the education sectors.
In a project conducted by Box Hill Institute of TAFE, *Crediting vocational education and training for learner mobility* by Sandra Walls and John Pardy, the long-standing problem of achieving good systems of credit transfer between VET organisations and universities is examined. The authors found that much still depends on those individuals who are committed to forging good pathways. And when it comes to enterprise registered training organisations, there is still much to be done to enable articulation into higher education.

Another area of change is the move toward understanding all activity within the VET sector that occurs nationally; in particular, understanding how much training is undertaken by private providers. In *Expanding national vocational education and training statistical collections: private provider engagement*, Andrew Smith, Rosemary Potter and Peter Smith give some insight into the barriers that private providers face in collecting student and enrolment data and suggest strategies that would assist them in supplying their VET data.

The current state of flux notwithstanding, many of the questions facing vocational education and training are persistent ones. An enduring challenge is how the system responds to skill demands and training needs in industry. New research examines the views of employers on training the workforce of specific industries. In *The role of VET in alcohol and other drugs workforce development*, Ken Pidd, Ann Roche and Amanda Carne look at the qualifications of staff in the alcohol and other drug workforce sector. The findings indicate that the majority of managers prefer workers with higher education credentials and that many thought the minimum-level qualification for the sector should be higher than a certificate IV. This suggests that vocational education and training will need to go ‘up market’ to align itself with the trends in this workforce.

In *Developing the childcare workforce: understanding ‘fight’ or ‘flight’ amongst workers*, Tanya Bretherton examines the high staff turnover in the early childhood education and childcare sector. Employers argue that workers need to develop a skill set that includes both care and education. Currently, these skills are gained through different career paths—vocational education and training for the ‘caring’ and university for the ‘education’—and it is unlikely they can be merged.

Looking at the meat processing industry, Kent Norton and Mike Rafferty (*Work, skills and training in the Australian red meat processing sector*) find training approaches have adapted to suit the new work systems, with training now occurring through on-the-job induction of single tasks, and training systems accommodating rather than preventing high rates of turnover. They argue that VET’s main target in this industry is at the supervisor level, saying that well-trained supervisors are necessary to impart the right skills to those entering the industry.

Despite challenges identified by employers, Josie Misko finds that the VET system has strong mechanisms for identifying the needs of specific industries and formulating training to meet these needs, but overburdening bureaucracy makes the system slow to respond. However, this is only one aspect of the system, and adaptation will only be effective if employers ensure employees acquire the new skills. These new skills can only be effective if there are adequate resources, appropriate teaching, rigorous assessment, an organisational culture that is conducive to training, and workers willing to engage (see *Responding to changing skill demand: training packages and accredited courses*). Moreover, as Karmel argues in *Skilling and reskilling for our (greener) future*, it is the dynamics of the economy such as changing costs, new technologies and regulations that often drive business demand for skills. Francesca Beddie (see *Dustman, milliner and watchcase maker: skilling Australia*) suggests in an historical essay that there is more work to be done to tease out what is meant by an industry-led system.

The issue of efficiency is perennial, but difficult to get a handle on. Peter Fieger, Tom Karmel and John Stanwick applied a statistical technique called Data Envelopment Analysis to compare the efficiency of 58 TAFE institutes across Australia. They found that the size of an institution matters, with efficiency being lower for very small and very large TAFE institutes. Being located in a remote region also affects efficiency (see *An investigation of TAFE efficiency*).
Geography is also a factor in determining where tradespeople work and how much they earn. Phil Lewis and Michael Corliss (Where tradies work: a regional analysis of the labour market for tradespeople) found that the major factors affecting demand for tradespeople are the business cycle, population movements and structural changes in the economy. Capital cities still attract tradespeople from rural and regional areas. While some can earn big wages if they work in remote Australia, it is also where the lowest-paid tradespeople are found.

We also need to know to what extent the acquisition of skills and particular modes of training deliver desirable outcomes. In a paper on skills mismatch, Kostas Mavromaras, Seamus McGuinness and Yin King Fok find that, compared with workers with no post-school qualifications or with university qualifications, those with vocational qualifications at the certificate III or IV level are less likely to experience overskilling and, if they do, they suffer fewer adverse consequences, such as periods of unemployment (see The incidence and wage effects of overskilling among employed VET graduates).

Tom Karmel continued his investigations into apprenticeships and traineeships. The impact of wages on the probability of completing an apprenticeship or traineeship and How reasons for not completing apprenticeships and traineeships change with duration by Karmel and Peter Mlotkowski discuss the low completion rates of apprenticeships and traineeships and the possible factors affecting completion, particularly low wage levels and the quality of workplaces and training. In The effectiveness of the traineeship model, Karmel, Davinia Blomberg and Monika Vnuk find that while traineeships do not seem to impact skills acquisition, they are an important employment pathway for women who are early school-leavers.

2010 was also the first year NCVER published work analysing data from the Longitudinal Surveys of Australian Youth (LSAY) to cast light on transitions from school to post-school study and work. In The role of VET in preventing the scarring effect of youth joblessness, Hielke Buddelmeyer and Nicolas Herault look at the effects of ‘scarring’ on young people. Scarring is where a period of unemployment increases the chance of subsequent and ongoing unemployment. They found that while most young people did not have long-lasting ill-effects from a spell of unemployment, having a post-school qualification further lessens the ‘scarring effect’. Buddelmeyer and fellow author Gary Marks confirm that having post-school qualifications—especially at the higher level—increases the chances of permanent employment (Annual transitions between labour market states for young Australians).

Another two pieces of work using LSAY—Against the odds: influences on the post-school success of ‘low performers’ by Sue Thomson and Kylie Hillman and Lost talent? The occupational ambitions and attainments of young Australians by Joanna Sikora and Lawrence Saha (published in January 2011, see <http://www.ncver.edu.au/publications/2313.html>)—show that both lower-performing and high-achieving youth benefit from having good career plans and aspirations. Labour market outcomes are not the only determinant of successful transitions. Mike Dockery looks at the relationship between education and happiness in Education and happiness in the school-to-work transition. He finds that undertaking vocational qualifications such as an apprenticeship has a positive impact on happiness both during the training period and after completion. For university graduates, however; happiness declines immediately following completion of their study.

A comparative piece using LSAY and the Canadian equivalent by Siobhan Austen and Fiona MacPhail, Post-school education and labour force participation in Canada and Australia finds that the Australian system provides students with low educational background or less advantaged family backgrounds with opportunities that the Canadian system does not. On the other hand, in the Canadian system there is a clear pathway from vocational colleges to university.
Other LSAY research looked at a variety of returns from education. Jung-Sook Lee in *Returns from education: an occupational status approach* finds that those with degrees tend to be in higher-status jobs, particularly by age 26 years. Wang-Sheng Lee and Michael Coelli in their paper *Analysis of private returns to vocational education and training*, discovered that measuring the private returns of vocational education and training is complex because various factors—such as educational background and the level and field of education— affect the results. They conclude that vocational education and training has a financial return for some, but not all individuals, depending on these factors.

While the labour market outcomes of young people in transition are an important focus of public policy, in Australia’s demographic configuration so too is the situation of older workers. In *Who works beyond the ‘standard’ retirement age and why?*, Chris Ryan and Mathias Sinning look at the characteristics of those who work beyond the standard retirement age of 65. They find that two groups of workers are more likely to remain working beyond 65—the most educated and the least educated. The former tend to be more engaged with work—and are more highly paid—while the latter tend to need the income. Those with vocational skills tend to retire around the standard retirement age.

Equity research commissioned under the National Vocational Education and Training Research and Evaluation Program and published in 2010 concentrated on disability. Cain Polidano and Kostas Mavromaras (*The role of VET in the labour market outcomes of people with disabilities*) find that vocational education and training is a useful pathway to help people with a disability find and maintain employment. In *What would it take? Employer perspectives on employing people with a disability*, Peter Waterhouse and colleagues argue that employers need more confidence and assistance to improve their capability to employ people with a disability.

The themes of equity and VET capability are evident in the research emanating from 2010. NCVER’s scholarship program provides VET practitioners without research experience with an opportunity to build their research capacity. In its third year, the community of practice scholarship program has produced a number of interesting papers. In *Measures of student success: can we predict module completion rates?*, Jeanette Learned from the Western Sydney Institute of TAFE developed a survey tool to predict when a student is at risk of dropping out. In *Breaking down the barriers: strategies to assist apprentices with a learning disability*, Sandra Cotton from Polytechnic West explores the difficulties confronting apprentices with a learning disability. In *Blind date: an exploration of potential partnerships between literacy teachers and community service workers*, Ann Leske from TAFE NSW Riverina Institute investigated the potential for team-teaching partnerships between literacy teachers and community service workers from the perspectives of these two groups. In *Does support for VET reduce employee churn? A case study in local government*, Kath Curry from Victoria University analysed staff training and turnover in the local government sector. In *Training and assessment (TAA40104) in community providers in New South Wales: participant intentions and outcomes*, Ruth Walker from Kiama Community College explores the goals of a group of people who have recently participated in the Certificate IV in Training and Assessment—particularly the initial expectations and how the intentions compare with the outcomes. Finally, *Using rubrics to support graded assessment in a competency-based environment* by Sherridan Maxwell from RMIT University considers the use of rubrics (sets of standards cross-referenced to assessment criteria) to support grading in a competency-based environment. A review of the building researcher capacity program by Ashlea Bartram, John Stanwick and Phil Loveder (see <http://www.ncver.edu.au/publications/2306.html>) found that this community of practice is working well as a means of developing more reflective practitioners and encouraging a deeper appreciation for research, something that will be essential for those VET providers who are positioning themselves to be part of a more integrated tertiary education and training sector.
Finally, a major exercise for NCVER in 2010 was the development of advice to the Ministerial Committee
on Tertiary Education and Employment about research priorities for 2011–13 (see <http://www.ncver.educ.net.au/research/priorities.html>). These now embrace the tertiary sector with a focus on examining the
outcomes from post-compulsory education and training. To assist in developing the priorities, NCVER
invited Diana Wilkinson, the then chief researcher in the Scottish Government, to compare the Australian
experience of using research to develop policy with that of Scotland (see Approaches to research priorities
for policy: a comparative study). She suggested the need for a stronger focus on strategic gaps in the evidence
base rather than on shorter-term issues, and the desirability of multi-disciplinary approaches to the research.
These ideas are part of the underpinning of the 2011–13 priorities. The overarching purpose of the
research priorities is to support the achievement of major social and economic goals, including increased
opportunities for participation in the labour market, improvements in productivity and achieving greater
equity in education. The priorities do this by encouraging research that will continue to inform tertiary
education policy and practice, much like the research from 2010.
Developing the childcare workforce: understanding ‘fight’ or ‘flight’ amongst workers

Tanya Bretherton

Higher qualifications in the early childhood education and care workforce are a central focus of new policy developed by the Council of Australian Governments (COAG). With new staffing requirements for early childhood education and care to be implemented through the National Quality Framework by 2014, it is timely to look at how child care providers develop their workforce.

The sector has traditionally been a low skill–low pay environment. Despite the challenges faced by the sector, some employers have employed successful strategies to develop the skills of the workforce. Based on case studies of four early childhood education and care providers, this report investigates how particular employers are overcoming the low skill–low-pay challenges in the industry to improve workforce development.

Key messages

Employers in this study are attempting to combat staff turnover—seen as a universal challenge for the sector—through careful recruitment and skill development. Two different recruitment strategies have been used:

– the recruitment of higher skilled staff
– the recruitment of less skilled staff, based on profiling characteristics rather than qualifications, followed by training.

Employers argue that workers in the sector must develop a skill set which offers an understanding of both care and education. These skills are currently gained through two different career paths, with carers trained through the vocational education and training (VET) sector and teachers trained through higher education, and it is doubtful whether these two career streams could be merged.

Any move to higher skill levels in the child care industry must impact on the economic structure of the industry. Higher skills inevitably mean increased wages, which must be met through fees or government subsidy.

Readers are directed to a research overview developed from this report, Workforce development in early childhood education and care <www.ncver.edu.au/publications/2260.html>.

Note: This publication was produced through the National Vocational Education and Training Research and Evaluation Program; see page 58 for details.

-developing-the-childcare-workforce-understanding-flight-or-flight-amongst-workers-can-be-found-on-NCVER-website
Work, skills and training in the Australian red meat processing sector

Kent Norton, Mike Rafferty

Work practices in the meat-processing industry have changed in recent years. The industry has moved away from workers dressing a whole carcass towards a chain-based system, with each worker performing a single task along a moving production line.

The nature of the meat-processing workforce has also changed. It is no longer dominated by seasonal but longer-term workers, usually white and male. It is now diverse and often characterised by workers with low levels of post-secondary education and literacy. Significant pools of labour are temporary (417 visa holders, backpackers and grey nomads), contributing to high levels of staff turnover.

This report investigates what these significant changes have meant for training in the industry.

Key messages

- Training systems have been adapted to accommodate the new work systems, with training now oriented to on-the-job induction and learning of single tasks.
- The case studies demonstrated the importance of quality supervision and the building of a safe and supportive culture in the workplace. Improved supervisor training, as well as practices that support workers as teams and individuals, results in safer and less stressful places to work.
- The training systems accommodate rather than prevent the high rates of labour turnover in the sector. The meat-processing industry employs many workers who are entering or re-entering the paid labour force, and many of these workers move onto other areas of the paid labour market.

This report arises from the second year of a three-year program of research on training and workforce development in industries which are characterised as low-skill entry points to the labour market. Readers may also be interested in an overview of this report, available from <www.ncver.edu.au/publications/2300.html>.
The role of VET in alcohol and other drugs workforce development

Ken Pidd, Ann Roche, Amanda Carne

The Alcohol and Other Drugs Council of Australia has identified attracting and recruiting staff as a problem area for the sector. An obvious strategy is to recruit people from a broad range of backgrounds, and then provide specific industry training. The vocational education and training (VET) sector is well placed to provide this training. The potential of VET to play this role was tested through surveys of managers of alcohol and other drugs service agencies and an analysis of student enrolment data.

Key messages

- The majority of managers preferred to employ workers with higher education qualifications because university graduates are seen to have higher levels of professionalism and better interpersonal skills.
- Nearly one in four managers was dissatisfied with vocational education and training. They suggested that training could be improved by placing greater emphasis on counselling and intervention, co-morbidity issues and clinical work placements.
- The new CHC08 Community Services Training Package, which has replaced the CHC02 Community Services Training Package, may address some of the concerns relating to training content but it may not resolve the managers’ concerns about delivery and assessment.
- Most managers supported the notion of a minimum qualification for the alcohol and other drugs sector. They indicated that it should be higher than a certificate IV level.

Note: This publication was produced through the National Vocational Education and Training Research and Evaluation Program; see page 58 for details.

The role of VET in alcohol and other drugs workforce development can be found on NCVER’s website: <http://www.ncver.edu.au/publications/2319.html>
What would it take? Employer perspectives on employing people with a disability

Peter Waterhouse, Helen Kimberley, Pam Jonas, John Glover

One focus of the Australian Government’s social inclusion agenda is to help people with a disability into work. The government’s new National Mental Health and Disability Employment Strategy acknowledges that a considerable barrier to employment for people with a disability is the lack of information for employers.

It is therefore timely to examine employer views on employing people with a disability. Based on a series of focus groups with employers from small-to-medium-sized enterprises, this report describes the attitudes of employers towards hiring a person with a disability. It also sets out some strategies that would assist businesses to take on employees with a disability.

Key messages

- The research confirmed that, even when employers are open to the idea of employing a person with a disability, they are often not confident that they have the knowledge, understanding and capability to do so.
- Disclosure (or more often lack of disclosure) of a disability is a key concern for employers, especially in relation to mental illness. However, employers readily conceded that this issue is mitigated if there is trust between the employer and employee.
- The role of trusted brokers and mediators emerged as a key issue. Small-to-medium-sized enterprises expressed frustration at their difficulties in accessing information relevant to their businesses.
- Employers are not looking for formal training in ‘disability employment’. They are looking for assistance in building their capacity to support the productive employment of people with a disability.

The vocational education and training (VET) system already helps employers to employ people with disabilities (by providing group training organisation field officers, for example), but this report suggests a broader role could be developed. Inevitably, this would require financial support from governments.

Note: This publication was produced through the National Vocational Education and Training Research and Evaluation Program; see page 58 for details.
Responding to changing skill demands: training packages and accredited courses

Josie Misko

This report, commissioned by the federal Department of Education, Employment and Workplace Relations (DEEWR), investigates whether vocational education and training (VET) has adapted to meet the changing needs of work. It provides examples of how work has changed for different occupations and functions, and how systemic mechanisms such as training packages and accredited courses are used to help the system respond to these changes.

The findings indicate in particular that:

- Regulation and business needs drive changes in the way the competency-based training system operates.
- The system has strong mechanisms for identifying the needs of specific industries and occupations and formulating units of competency in training packages and accredited courses to address these needs. However, too much bureaucratic red tape and unnecessary detail make the system sluggish in responding to emerging needs in a timely fashion.
- Having strong mechanisms for the development and review of training packages and accredited courses is only part of the picture. These must be complemented by effective teaching and rigorous assessment practices, as well as up-to-date materials and technology for learning.

Adaptation of the training system is one thing, but it will only be effective if employers ensure employees acquire the new skills. This requires an organisational culture which is conducive to training, and worker willingness to engage in training.

Note: This publication was produced through NCVER’s consultancy work; see page 58 for details.
Where tradies work: a regional analysis of the labour market for tradespeople

Phil Lewis, Michael Corliss

Before the Global Financial Crisis there was much discussion about skills shortages in Australia. The economy was nearing full employment and skills shortages were perceived as constraining growth.

As the Australian economy recovers from the economic downturn, attention once again turns to avoiding or addressing skills shortages—as illustrated by the current inquiry into the applicability of government employment policies in addressing the skills shortages in regional Australia currently being conducted by the House of Representatives Standing Committee on Employment and Workplace Relations.

It is therefore timely to look at how the labour market has responded to changes in the supply and demand of tradespersons through the varying economic conditions of the past 20 years.

Key messages

- The major factors affecting demand for tradespersons are the business cycle, population movements and structural changes in the Australian economy.
- The analysis showed that the labour market for tradespersons is largely efficient. Migration—both from overseas and internal—and changes in earnings appear to have been important ways of adjusting supply and demand.
- Migration from overseas played an important role in the economic development of urban Western Australia and in the mining boom in remote Western Australia. In terms of regional movement, capital cities continue to attract tradespersons from rural and regional areas.
- There is considerable variation in median earnings within and between different trades and regions. While the relative earnings of the lowest-paid tradespersons have fallen over time, the earnings of the highest-paid have grown. This difference between the lowest- and highest-earning tradespersons is most extreme in remote regions.

Note: This publication was produced through the National Vocational Education and Training Research and Evaluation Program; see page 58 for details.

Where trades work: a regional analysis of the labour market for tradespeople can be found on NCVER’s website <http://www.ncver.edu.au/publications/2273.html>
Does support for VET reduce employee churn? A case study in local government

Kath Curry

Building the research capacity of the vocational education and training (VET) sector is a key concern for the National Centre for Vocational Education Research (NCVER). To assist with this objective, NCVER supports a community of practice scholarship program, whereby VET practitioners without research experience are given the opportunity to undertake their own research to address a workplace problem. Scholarship recipients are supported by a mentor, and NCVER publishes their research results.

Kath Curry participated in the 2009 community of practice. Kath is currently Associate Director of Quality and Capability in the Faculty of Technical and Trades Innovation at Victoria University. The research for this paper was undertaken while Kath worked as National Workforce Development Advisor at Government Skills Australia. The paper investigates the extent to which local government councils offer vocational education and training as a strategy to retain their employees.

The study comprised interviews with key human resource personnel in 14 councils around Australia, as well as an analysis of council records on staff training and turnover.

Key messages

- Many councils had limited records of staff training and turnover rates and did not have systems in place to evaluate the benefits derived from investing in training.
- Reasons ‘to stay’ and reasons ‘to quit’ are different. The human resource personnel interviewed believed that career development or training opportunities were not why employees stayed with an organisation, but that a lack of such opportunities might cause them to leave.
- The uptake of the local government training package was reportedly low due to the limited availability of registered training organisations prepared to deliver according to the package as well as low levels of publically subsidised offerings.
- Interviewees were somewhat sceptical about the quality and value of VET to their councils, but said they would continue to use the VET system for staff training as it was the most widely used option currently available.

Note: This publication was produced through the National Vocational Education and Training Research and Evaluation Program; see page 58 for details.

Does support for VET reduce employee churn?
A case study in local government

Students and individuals
Against the odds: influences on the post-school success of ‘low performers’

Sue Thomson, Kylie Hillman

The link between academic performance and labour market outcomes is well established. People who are low academic performers are more likely to leave school early, limiting their access to higher occupational status jobs and therefore higher earnings, or placing them at greater risk of unemployment or underemployment.

But does poor performance in a test of literacy necessarily compromise later success? Using the 2003 cohort of the Longitudinal Surveys of Australian Youth (LSAY), Thomson and Hillman examine this question. ‘Success’ in this context encompasses satisfaction with life, together with the extent to which young people are fully occupied with education or employment or a combination of these.

The researchers have extrapolated from the Programme for International Student Assessment (PISA) results of the 2003 LSAY cohort to consider how those with poor numeracy (the main focus of the 2003 PISA test) cope during their transitions from school.

Key messages

- Academic under-achievement is not the end of the road for most students, with almost three-quarters of those who were ‘low performers’ at age 15 years going on to make a successful transition into full-time work or study (or a combination of these).
- Motivation is a key determinant of students’ later outcomes, with those who see the value of study such as mathematics for their future success more likely to achieve this success.
- Ensuring that the school experience is a positive one for low-performing students may be a challenging task, but can be worth the effort, with positive impacts on young people’s lives at the time they are at school, and, it appears, once they have left school.
- Low-performing students from socioeconomically disadvantaged households are less likely to be successful than their more affluent counterparts, suggesting that the degree to which parents can help their children may be a factor.
- Having some sort of career or strategic plan, such as aspiring to do an apprenticeship, is particularly important for determining later success in life.

Note: This publication was produced through the Research Innovation and Expansion Fund Program; see page 58 for details.
Returns from education: an occupational status approach

Jung-Sook Lee

Having a higher level of education affords individuals many opportunities and benefits such as a higher income, increased employment choices and greater job security. Beyond the individual, an increasing level of education contributes to the economic growth and wellbeing of society.

Typically, the returns from education are measured by earnings. However, earnings for young people may be a poor indicator of the longer-term returns from various education choices. An alternative approach is to focus on the occupations in which young people find themselves. Specifically, the occupation’s status (or prestige) is likely to capture many of the future benefits that an individual could reasonably expect.

Using data from the 1995 cohort of the Longitudinal Surveys of Australian Youth (LSAY), which followed a cohort of young people who were in Year 9 in 1995 for 12 years to 2006, Lee looks at individual returns from education for young people aged 16 to 26 years. The study investigates how growth in occupational prestige is related to the level of education achieved and whether the effect of education on the growth in occupational prestige differs by gender as well as by individual characteristics and family backgrounds. Lee finds that, not surprisingly, occupational prestige grows steadily from the ages 16 to 26 years. She also finds that those with degrees tend to be in higher-status jobs, particularly by age 26 years.

Key messages

- The gaps in occupational prestige among young people with different educational attainment become larger as time passes.
- At age 21, females tend to have higher occupational prestige than males, with the difference particularly notable among young people who did not complete Year 12.
- Family background characteristics continue to influence young people’s occupational prestige above and beyond the influence of their educational attainment.

This analysis brings home the labour market advantage that a degree brings in a way that a straight comparison of young people’s earnings does not.

Note: This publication was produced through the Research Innovation and Expansion Fund Program; see page 58 for details.
Breaking down the barriers: strategies to assist apprentices with a learning disability

Sandra Cotton

Building the research capacity of the vocational education and training (VET) sector is a key concern for the National Centre for Vocational Education Research (NCVER). To assist with this objective, NCVER supports a community of practice scholarship program, whereby VET practitioners without research experience are given the opportunity to undertake their own research to address a workplace problem. Scholarship recipients are supported by a mentor, and NCVER publishes their research results.

Sandra Cotton participated in the 2009 community of practice program. Sandra is the Disability Services Manager at Polytechnic West in Western Australia. Her research explores the difficulties confronting apprentices with a learning disability and the strategies that assist them to overcome these difficulties and to achieve unit of competency completion.

The study comprised a survey of apprentices with a learning disability, a focus group made up of lecturers and disability services staff, and interviews with family members to identify the successful strategies used by apprentices, lecturers and support staff.

Key messages

- The apprentices surveyed reported having the most difficulties with reading and understanding texts. Focus group participants pointed out that the frustration this causes students can lead to other problems such as withdrawal from participation in class and denial of the problem. Non-disclosure was seen as a big concern as it limited the amount of support students could be given.
- Instructional approaches that accommodate students’ learning styles, individual mentoring or tutoring to help clarify concepts, and supportive relationships were strategies endorsed by both the apprentices and the staff as effective in helping the students to complete units of competency.

Note: This publication was produced through the National Vocational Education and Training Research and Evaluation Program; see page 58 for details.

Education and happiness in the school-to-work transition

Alfred M Dockery

Very few would argue that education does not enhance people’s lives, with higher educational attainment being linked to better career paths and health. It is curious then that previous research has found that attaining higher levels of education is linked to lower levels of happiness or satisfaction with life. This would appear to be at odds with current policy promoting the value of further education. Could it be that attaining higher education sets people up to fail by encouraging expectations that can never be met?

Using data from the 1995 Year 9 cohort of the Longitudinal Surveys of Australian Youth (LSAY), Mike Dockery examined the relationship between individuals’ highest level of education and their self-rated happiness. He also looked at the impact of factors such as family circumstances while at school and personality traits on this relationship.

Key messages

- Undertaking vocational qualifications, such as an apprenticeship or traineeship, has a positive impact on happiness during the training period, with happiness continuing after completion.

- For university graduates, it would appear that their university days were their glory days, with the graduates’ high levels of happiness declining upon completion of their qualification. Unfortunately, as the cohort is only tracked until their mid-20s, it is not possible to determine whether this is a temporary dip upon entering the labour force or a more permanent state.

- Early school leavers and youth at risk (sole parents or low-income family) experience persistent adverse impacts on their career outcomes and wellbeing.

The young people who make up the 1995 and 1998 cohorts of LSAY have all been interviewed in relatively prosperous economic times. It will be interesting to see if, and to what degree, happiness varies for later cohorts, following the adverse global economic events of late 2008. It would also be interesting to track happiness past the mid-20s to see whether the differences between apprenticeships and university graduates, for example, persist.
The impact of wages on the probability of completing an apprenticeship or traineeship

Tom Karmel, Peter Mlotkowski

Low completion rates in apprenticeships and traineeships have been of concern for many years. Explanations have been the low level of apprentice and trainee wages on one hand, and other factors such as the quality of workplaces and training, on the other. The focus of this paper is on wages and the impact they have on the decision not to continue with an apprenticeship or traineeship.

Key messages

- For most apprentices and trainees, expected wages in alternative employment are greater than wages during training. Apprentices and trainees are indeed being paid a training wage.

- Only for trade apprentices (specifically, electrotechnology and telecommunications, construction, and automotive and engineering) do expected wages on completion significantly exceed expected wages in alternative employment. For these occupations the value of completing the qualification is high. Thus the concept of a training wage, from the point of view of an investment in skills, makes obvious sense for apprentices in these occupations, but less so in other occupations.

- We find that 'wedges' between the training wage, the wage in alternative employment and the wage on completion have a limited effect on completion. For apprentices it is the premium attached to completion that matters. For male non-trade trainees the wedge between the training wage and the wage in alternative employment does have an impact on completion. For females in non-trade traineeships we found no relationship between wages and the probability of completing a traineeship.

Thus the broad conclusion is that training wages should not be the focus of attention in increasing completion rates. The study also raises the question of whether traineeships in some occupations—sales, for example—are contributing to increased skill levels in any substantive manner. It would seem that many traineeships are more about employment than skills acquisition.
Post-school education and labour force participation in Canada and Australia

Siobhan Austen, Fiona MacPhail

A recent report by the Organisation for Economic Co-operation and Development (OECD 2008b) into youth labour markets in OECD countries highlights that, in 2006, half of all young people aged 20 to 24 years in Canada held a post-school qualification, in contrast to 38% in Australia. This is a difference that deserves closer examination, especially when Australia is seeking to considerably increase participation in tertiary education.

Using data from the Longitudinal Surveys of Australian Youth and the Canadian Youth in Transition Surveys, this report focuses on the post-school pathways and outcomes for young adult men and women in Australia and Canada. Austen and MacPhail find distinct differences in the characteristics of students who participate in Australia’s vocational education and training (VET) system and Canada’s college—as distinct from the university—system.

It needs to be noted, however, that there are marked differences between the two systems, which may impact on the post-school choices young people make. In general, the Canadian college system provides students with the choice of two distinct pathways: a vocational or career pathway via vocationally oriented programs, or an academic pathway to university via pre-university programs. The Australian VET system provides vocational education and training, although there has been increasing attention given to articulation between VET and higher education.

Key messages

- The authors speculate that the Australian VET sector provides students with low educational outcomes or who are from less advantaged family backgrounds with educational opportunities that are not present in the Canadian system.
- In contrast to the Canadian college system, the Australian VET system is not considered an educational pathway of choice for higher-achieving school students or those from more advantaged backgrounds. Perhaps this is because Canadian colleges offer a clear pathway to university.
- High educational attainment helps protect young women against withdrawal from the labour market once they become parents. This increased attachment to the labour market is likely to have an impact on employment and earnings chances over the life course.

Note: This publication was produced through the Research Innovation and Expansion Fund Program; see page 58 for details.
The role of vocational education and training in the labour market outcomes of people with disabilities

Cain Polidano, Kostas Mavromaras

The Australian Bureau of Statistics (ABS) 2003 Survey of Disability, Ageing and Carers found that nearly one in five Australians has a disability, with only about half of those of working age participating in the labour market, by comparison with over 80% of 15 to 64-year-olds without a disability. A low level of education generally among people with a disability is one of the factors contributing to their lower rate of labour market participation.

Using data from the Household, Income and Labour Dynamics in Australia (HILDA) survey, this study examined whether completing a vocational education and training (VET) qualification helped people with a disability to get a job and stay in employment. While the study found completing a VET qualification provided no further employment benefits for those already employed, for people who are not working, completing a VET qualification significantly increased the likelihood of subsequent employment—more so for people with a disability than without. The authors suggest that the accessibility of VET, by comparison with other post-school education pathways, may make this pathway more attractive for people with a disability, while the attainment of demonstrated competencies or skills is a positive signal to employers.

This study, which makes use of the longitudinal aspect of the Household, Income and Labour Dynamics in Australia survey, is an important contribution to policy deliberations about the provision of education and training opportunities for people with a disability. It suggests that helping people with a disability get a ‘first job’ is likely to reduce the scarring effect that being out of work has on future employment prospects.

Key findings

- While people with a disability find it considerably harder to retain employment, VET completion strongly improves their chances of getting and keeping a job.

- Childhood onset of a disability is more disruptive than onset in later life. This is in line with the hypothesis developed by the economist Heckman that disruption of skill acquisition at an early age has cumulative effects.

- People for whom the onset of a disability occurs later in life are more likely to be employed. This may be due to skill acquisition before the onset of disability but, more importantly, it may be because they have work experience. However, they are less likely to participate in VET.

- Attrition from VET courses occurs at a greater rate among people with a mental health condition, who report that they are often unable to access help from others.

Note: This publication was produced through the National Vocational Education and Training Research and Evaluation Program; see page 58 for details.
Who works beyond the ‘standard’ retirement age and why?

Chris Ryan, Mathias Sinning

One of the challenges facing Australia’s labour supply today is its ageing population. As observed in the Australian Government’s 2010 intergenerational report, in the future there will be fewer workers to support retirees and young dependents. With life expectancy increasing, and with adjustments to public policy aimed at encouraging older workers to stay in the workforce, the decisions people make about retirement are changing. It is therefore useful to consider who works beyond the ‘standard’ retirement age—defined by the authors as 65 years—and why.

This report describes the characteristics of those who continue to work beyond the age of 65 and examines how the skill requirements of their jobs and their remuneration change over time.

Key messages

❚ Two groups of workers, in terms of their educational qualifications, are more likely to remain working beyond the age of 65 years—the most-educated and the least-educated.

❚ Workers with vocational skills tend to retire around the standard retirement age. After standard retirement age the labour force participation rate of those with vocational qualifications declines more than for workers with higher and lower educational levels.

❚ Educational attainment is a strong predictor of wage levels among older workers, more so than document literacy and literacy use.

The finding that the most-educated and the least-educated are the ones to remain working beyond the age of 65 years probably reflects two of the components that make work attractive—remuneration and job satisfaction. The most-educated tend to have more interesting jobs with high wage levels. By contrast, the least-educated have significantly lower lifetime incomes and may well be working to maintain living standards. The policy implications are that retirement income policies matter, as do policies such as flexible work arrangements that make work more satisfying.

Note: This publication was produced through the National Vocational Education and Training Research and Evaluation Program; see page 58 for details.
Analysis of private returns to vocational education and training

Wang-Sheng Lee, Michael Coelli

In 2008, as part of a national push to increase Australia’s skill levels, the Council of Australian Governments (COAG) agreed on targets that would see, by 2020, a doubling of diploma and advanced diploma completions and a halving of the proportion of 20 to 64-year-old Australians without at least a certificate III. Such targets assume there is a financial return as a result of undertaking vocational education and training (VET). Using data from the Australian Bureau of Statistics (ABS) Surveys of Education and Training (1993–2005), this study investigated this assumption by looking at the employment and earnings for individuals who had completed a VET course, and how these may have changed over time.

This work examines the effect of field of education on the returns from VET for individuals, as well as the returns from VET for mature-age students (defined here as persons between 30 and 64 years). It also compares these with higher educational qualifications. This study differs from previous research on returns from VET in that it does not determine the individual rate of return from investing in a VET course. Rather, the authors determine the effects of educational qualification on employment and earnings outcomes, and how these have changed over time.

Key messages

- Compared with those who have completed Year 12, employment and earnings benefits are only gained by completing a VET course at the diploma level. This result differs from some previous studies (for example, Long & Shah 2008). However, by comparison with individuals who do not complete Year 12, both employment and earnings benefits can be gained from completion of a VET qualification at any level, an outcome which accords with previous research.
- Undertaking courses in the area of business, engineering, architecture, building and automotive provides the greatest benefits relative to those who did not complete Year 12.
- For mature-age students, those who have not completed Year 12 and undertake a VET course at the certificate III level or higher gain the greatest employment and earnings benefits. However, there is a lag of several years before these benefits materialise.
- The study covers the period 1993 to 2005 to assess whether VET qualifications have continued to attract similar returns relative to Year 12 and non-school completers. The earning benefits from completing a diploma were shown to be relatively stable during this period. At the sub-diploma level there were more fluctuations but, relative to non-school completers, returns from these qualifications were positive. This was not the case when comparisons were made with Year 12 completers.

The difference in findings between this and previous studies highlights the complexity of measuring private returns from education. Decisions made about the comparison groups, the degree of disaggregation of educational levels, data sets and the statistical techniques used all impact on the results. So too does the influence of variables such as prior educational achievement, ability, opportunity or motivation—variables which are not present in the Survey of Education and Training. Nevertheless, this study makes it clear that we cannot assume VET has a financial return to the individual; it all depends on educational background and the level and field of the qualification being undertaken.

Note: This publication was produced through the National Vocational Education and Training Research and Evaluation Program; see page 58 for details.
Measures of student success: can we predict module-completion rates?

Jeanette Learned

Building the research capacity of the vocational education and training (VET) sector is a key concern for the National Centre for Vocational Education Research (NCVER). To assist with this objective, NCVER supports a community of practice scholarship program, whereby VET practitioners without research experience are given the opportunity to undertake their own research to address a workplace problem. Scholarship recipients are supported by a mentor, and NCVER publishes their research results.

Jeanette Learned participated in the 2009 community of practice. Jeanette is a head teacher at Blue Mountains College, part of the Western Sydney Institute of TAFE. To help teachers identify when intervention strategies to prevent student drop-out are required, Jeanette developed a tool to predict when a student was at risk of leaving a course.

The study involved piloting the survey tool with three classes at a medium-sized vocational education college in an outer suburban area. Attendance rates and final course results were also collected from the college records and matched to the survey data.

Key messages

- Attendance is a key factor in students passing modules.
- The survey tool was useful in predicting whether a student was at risk of leaving. The overall score calculated as a result of all attitudinal variables correlated well with the final module-completion rate, and students with falling overall scores dropped out before the end of semester.
- Based on comments from some students, the author identified a potential ‘Hawthorn effect’, whereby the tool had the potential to improve class participation simply by causing the students to reflect on their own performance.

The finding that it is possible to obtain useful feedback about student progress in the first few weeks of class suggests that teachers are in a good position to influence course completions.

Note: This publication was produced through the National Vocational Education and Training Research and Evaluation Program; see page 58 for details.
Using rubrics to support graded assessment in a competency-based environment

Sherridan Maxwell

Building the research capacity of the vocational education and training (VET) sector is a key concern for the National Centre for Vocational Education Research (NCVER). To assist with this objective, NCVER sponsors a community of practice scholarship program, whereby vocational education and training practitioners without any research experience are given the opportunity to undertake their own work-based research project. Scholarship recipients are supported by a mentor and NCVER publishes their research results.

Sherridan Maxwell participated in the 2008 community of practice program. Sherridan is a senior educator, Curriculum and Project Design, at RMIT University. Her research investigates the use of rubrics—in this context, sets of standards cross-referenced to assessment criteria—to support grading in a competency-based environment.

The study comprised mentoring a small group of teachers in developing their own rubrics for assessment, as well as interviewing these teachers to determine their thoughts on the use of rubrics.

Overall, the teachers found rubrics to be a useful tool not only for assessment but also for informing students of the assessment expectations.

The author also suggests the use of rubrics as a tool for assisting in articulation into higher education from the VET sector.

Note: This publication was produced through the National Vocational Education and Training Research and Evaluation Program; see page 58 for details.
Building the research capacity of the vocational education and training (VET) sector is a key concern for the National Centre for Vocational Education Research (NCVER). To assist with this objective, NCVER supports a community of practice scholarship program, whereby VET practitioners without research experience are given the opportunity to undertake their own research to address a workplace problem. Scholarship recipients are supported by a mentor, and NCVER publishes their research results.

Ann Leske participated in the 2009 community of practice. Ann is an adult literacy teacher and TAFE STEPS program coordinator at the Wagga Wagga campus of TAFE NSW’s Riverina Institute. Ann’s research investigates the potential for team-teaching partnerships between literacy teachers and community service workers from the perspectives of these two groups.

The study comprised interviews and surveys with community service workers and literacy teachers to uncover their views on partnerships with each other.

Key messages

- Overall, literacy teachers are more positive about the potential for partnerships than community service workers. The majority of community service workers view literacy teachers as consultants rather than as partners.

- Both groups of professionals have differing views about the meaning of literacy. These divergent views can be an obstacle to forming successful partnerships.

- Community service workers are unsure about what literacy teachers actually do. If partnerships are to proceed, both community service workers and literacy teachers need to develop a greater awareness and appreciation of each other’s roles.

Note: This publication was produced through the National Vocational Education and Training Research and Evaluation Program; see page 58 for details.
Practitioner expectations and experiences with the Certificate IV in Training and Assessment (TAA40104)

Berwyn Clayton, Dave Meyers, Andrea Bateman, Robert Bluer

The Certificate IV in Training and Assessment (TAA40104) is seen as the standard entry-level teaching qualification in the vocational education and training (VET) sector. The qualification is widely accepted and well supported as an essential requirement for VET practitioners. However, it has been criticised in relation to its ability to provide the level of skills and knowledge required. This report turns to the newly qualified practitioners themselves and asks them whether they believe that the certificate has provided them with an effective foundation for the delivery and assessment of training in the VET environment.

The report surveys new graduates of the Certificate IV in Training and Assessment, via an online survey just after they had completed the certificate, and again via semi-structured interviews six months later. The survey and interview focus on the graduates' sense of preparedness and confidence in planning, delivering and assessing training, as well as their views on the benefits and limitations of this qualification.

Key messages

- When taught well, the certificate provides some if not all of the essential skills required of new practitioners, particularly if they already have some experience of training, if they are supported by mentors and if they undertake further developmental activities after they graduate.
- Participants felt less well prepared to manage the needs of diverse learners, to undertake assessment, to use training packages and to manage classroom issues. These areas should be given more emphasis in the program.
- A more flexible program structure is needed to cater for the diversity of job roles and responsibilities of VET practitioners, as well as for the differing levels of experience of training and VET that participants bring to the program. The authors suggest this might be addressed through the introduction of differentiated qualifications, skill sets and an orientation program for those unfamiliar with VET when they embark on the certificate IV.
- Those delivering the Certificate IV in Training and Assessment must be appropriately experienced and qualified and capable of modelling good practice.

Note: This publication was produced through the National Vocational Education and Training Research and Evaluation Program; see page 58 for details.

Practitioner expectations and experiences with the Certificate IV in Training and Assessment (TAA40104) can be found on NCVER’s website <http://www.ncver.edu.au/publications/2312.html>
Training and assessment (TAA40104) in community providers in New South Wales: participant intentions and outcomes

Ruth Walker

Building the research capacity of the vocational education and training (VET) sector is a key concern for the National Centre for Vocational Education Research (NCVER). To assist with this objective, NCVER supports a community of practice scholarship program, whereby VET practitioners without research experience are given the opportunity to undertake their own research to address a workplace problem. Scholarship recipients are supported by a mentor, and NCVER publishes their research results.

Ruth Walker participated in the 2009 community of practice program. Ruth is the accredited training manager at Kiama Community College. Her research explores the goals of a sample of people who had undertaken the Certificate IV in Training and Assessment, their initial expectations of the course, and how their intentions compare with their actual outcomes.

The study used a mixed method approach that comprised a quantitative survey of people who had enrolled in the qualification at one of the 25 adult and community education institutions in New South Wales in 2008, as well as semi-structured phone interviews with some of the survey participants to explore in more depth the themes emerging from the survey.

Key messages

- Eighty per cent of respondents reported that they had achieved what they wanted from the course, despite only a third of respondents gaining a training job.
- Students gained social capital from the course, with respondents reporting that they had increased their confidence, expanded their professional networks, and made employment links with the college at which they undertook their training.
- Participants were more likely to report that the course met their expectations if they also reported that pre-course information was important to them in choosing their training organisations, suggesting that preconceived notions about course content may have a significant impact on satisfaction.

Note: This publication was produced through the National Vocational Education and Training Research and Evaluation Program; see page 58 for details.
Approaches to research priorities for policy: a comparative study

Diana Wilkinson

The National Centre for Vocational Education Research (NCVER) is managing a consultation process to consider education and training research priorities for 2010 and beyond. To begin deliberations a forum of invited stakeholders was convened in October 2009.

Diana Wilkinson, Chief Social Researcher with the Scottish Government, was invited by NCVER to kick off the process by discussing the nexus between research and policy.

Key messages

❚ Australia, by comparison with Scotland, lacks an overarching skills and lifelong learning policy, under which the national research priorities could be framed. On the other hand, while the Scottish and United Kingdom governments invest a considerable amount of funding in educational research, there are no ‘national research priorities’ to shape that investment.

❚ The cross-cutting nature of VET research, the complex problems it seeks to address and its relevance to wider policy contexts demand multi-disciplinary approaches to the research.

❚ To encourage research that is more forward looking, the national priorities should focus on the strategic gaps in the evidence base rather than on shorter-term issues.

Following the consultations, the NCVER Board, in mid-2010, will provide advice to the education and training ministers on the national priorities.

Note: This publication was produced through the National Vocational Education and Training Research and Evaluation Program; see page 58 for details.
The future of VET: a medley of views

Francesca Beddie, Penelope Curtin (Editors)

These essays emerged as a result of a conversation between Tom Karmel and Peter Noonan, one of the contributors to this collection, which is intended to stimulate thinking about how the current appetite for vocational education and training (VET) reform can be harnessed to shape a bright future for vocational education.

NCVER approached six writers and commentators on VET to give us their views on the future of VET. Robin Shreeve, John Hart, Myree Russell, Virginia Simmons, Gavin Moodie, Peter Noonan and Tom Karmel have all contributed essays. We asked Robin Ryan, both an historian of and commentator on vocational education, to pull together themes emerging from the various essays. He has articulated five themes:

- the need for a new ‘settlement’ to address the federal governance of vocational education and, over time, improve funding mechanisms
- the better articulation of VET’s purposes to serve individuals and communities and VET’s role in the tertiary education sector
- a more successful marriage of curriculum and competence, including addressing the place of training packages
- the use of the history of VET—what’s worked and what hasn’t—to inform the current reform effort
- the importance of maintaining an employer and industry voice in VET.

Note: This publication was produced through the National Vocational Education and Training Research and Evaluation Program; see page 58 for details.
The effectiveness of the traineeship model

Tom Karmel, Davinia Blomberg, Monika Vnuk

Over 20 years ago, during a period of high youth unemployment, Peter Kirby recommended that a system of traineeships be adopted for disadvantaged 16- and 17-year-olds. Growth in traineeships was initially slow until the mid-1990s, when rapid growth followed a series of reforms to traineeships. The reforms included the introduction of employer incentives and the widening of traineeships to existing workers, part-time workers, and older workers.

This paper builds on work commissioned by the Victorian Interdepartmental Policy Unit on Youth Transitions into the effectiveness of traineeships for the youth cohort. Our findings suggest that traineeships are an important pathway for female early school leavers. However, if the target group for traineeships is disadvantaged young people, then they are poorly targeted. The employment outcomes from traineeships are good, particularly for young early school leavers, but we find little evidence that traineeships have had a significant impact on skills acquisition.

Overall, we conclude that the traineeship model is a good one, as the mixture of formal education and experience in the workplace is educationally very attractive. Our suggestions for improvement relate to better targeting of government support. In particular, we suggest that government support be targeted towards disadvantaged job seekers, such as early school leavers.

Note: NCVER consultancy work funded through the Department of Education, Employment and Workplace Relations; see page 58 for details.
How reasons for not completing apprenticeships and traineeships change with duration

Tom Karmel, Peter Mlotkowski

This short paper adds to the considerable literature on low completion rates for apprenticeships and traineeships by looking at whether the reasons given for not completing vary by how far the individual is into their contract of training.

The approach we take is to calculate the probability of apprentices and trainees giving a particular reason as their main reason for not completing, at each point in the training contract. The results are then disaggregated into three groups: trades, non-trades (male) and non-trades (female).

Key messages

- Most of the reasons given for not completing an apprenticeship or traineeship vary by how far the individual is into their training contract, with the patterns being largely consistent between the three groups.
- The desire to do something different (such as study at university) or better (such as getting a better-paid job) is the only reason remaining constant throughout the duration of the training contract. It appears that apprentices and trainees are always looking out for a better alternative.
- By contrast, poor working conditions or non-sympathetic bosses or workmates have an immediate effect for many, but then decrease in importance with duration.

These patterns provide useful indications on how policy responses to low completion rates may be framed to address the different stages of the training contract.

Note: This publication was produced through the NCVER Core Research Program; see page 58 for details.
Building capability in vocational education and training providers: the TAFE cut

Hugh Guthrie, Berwyn Clayton

This paper focuses on issues which affect the capability of technical and further education (TAFE) providers. It draws extensively on the reports of seven research activities conducted during a two-and-a-half-year program of research. The program examined a diverse range of issues: career pathways for TAFE provider staff, teaching and learning, organisational cultures and structures, learning through work, human resource development, leadership and workforce development. Publications from this research program can be found at <http://www.ncver.edu.au/research/projects/10345.html>.

Key messages

- There is a gap between the ‘rhetoric’ of policy and the ‘reality’ of the operational constraints within which TAFE providers operate. TAFE providers need to be free of unnecessary central constraints to manage their human resources in ways which best meet their strategic business needs. This includes having more direct control of industrial relations.
- The professional nature of the work TAFE practitioners do is not sufficiently well understood or appreciated. More attention and resources need to be devoted to work design and workforce development.
Expanding national vocational education and training statistical collections: private provider engagement

*Andrew C Smith, Rosemary Potter, Peter J Smith*

Nationally recognised training in Australia has grown significantly over the last ten years. We have good data on publically funded training but only relatively poor coverage of privately funded training delivered by private registered training organisations.

In this report, the authors provide insight into the barriers to collecting data on students and their enrolments from private training providers.

The authors suggest a number of strategies to encourage the participation of private providers in the official data collection, including:

- providing clear definitions on data requirements, stability in these requirements over time, and support for providers who currently have no knowledge of the current data standards
- simplifying the data-submission process through web and other broad interfaces in a secure environment
- collecting the information through a central agency, not state and territory training authorities
- supplying software to assist providers in the collection of the required information
- ensuring any system developed also meets other reporting needs (such as those of the Australian Quality Training Framework)
- developing a set of protocols regarding the use of any data to ensure confidentiality and agreement that it is not be used for provider-benchmarking purposes
- providing useful reports and other services to providers in a timely manner as a ‘pay-off’ for supplying information to the national collection.

These findings are helpful in designing a better vocational education and training data collection and reporting system, one that covers all nationally recognised training.

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Note: NCVER consultancy work funded through the Department of Education, Employment and Workplace Relations; see page 58 for details.

An investigation of TAFE efficiency

Peter Fieger, Tom Karmel, John Stanwick

The interest in efficiency comes from two angles. First, governments and systems have an interest in the overall efficiency of systems, and the relative efficiency of institutions within a system. Second, individual institutions may wish to benchmark themselves against their peers.

This paper employs a mathematical technique—Data Envelopment Analysis—to compare the efficiency of 58 TAFE (technical and further education) institutes across Australia. Efficiency is measured as the ‘ratio’ of outputs to inputs, with outputs being the combination of successful full-year training equivalents (that is, adjusted for load pass rates) for trade/technician and non-trade/technician courses, and the inputs being expenditure on salaries and related expenses, and other expenditure, excluding capital costs.

Efficiency scores, which take into account the size of the institution, are derived for each institute, and peer institutes are identified. However, there are likely to be environmental factors that impact on efficiency, and these need to be taken into account in any comparison of institutes.

The following are the main findings:

- According to the analysis, 17 institutes are efficient, relative to their peers.
- The environmental factor that most significantly affects efficiency is the degree of remoteness.
- Size matters, with efficiency being lower for very small and very large institutes. On the whole the penalty is greater for very small institutes.

While it is acknowledged that the technique has many limitations, it does allow institutes to benchmark themselves. The results should provoke questions, if not answers. In addition, the analysis should be helpful to those considering structures that impact on the size of an institute. Readers will note that, as dictated by the National Training Statistics Committee’s data protocols, institutes are not identified. This type of analysis would be rather more informative if institutes were identified, and the protocols are currently being reviewed with this in mind.
A short history of initial VET teacher training

Hugh Guthrie

This paper examines the history of initial VET teacher training, both through the literature and the author's own experience. It also provides a backdrop to Guthrie and his colleagues’ examination of current practice in teacher training. Their forthcoming report, Initial training for VET teachers: a portrait in a larger landscape, is a clear reminder that initial teacher training is only the first step in ongoing professional development for the sector’s teachers.

There is an unprecedented interest in VET teachers, the quality of teaching and teacher training at present. However, as Guthrie points out, this is a road well trodden and, unfortunately, issues identified earlier remain unresolved. But Guthrie is optimistic.

Key messages

- The minimalist regulatory approach of the Certificate IV in Training and Assessment as the mandated qualification for VET teachers and trainers needs to change and it is time to accept a broader range of qualifications as a suitable foundation for teaching in VET. This should be based on a wider range of issues: the teaching role, the provider profile and the characteristics and needs of their students.
- A more rigorous application of regulatory requirements for staff to maintain vocational competency and develop their teaching skills will ensure that teachers do not remain with minimal qualifications.
- The ‘skill set’ approach mooted for the new Diploma in Training and Assessment will lead to more formal professional development being taken up by staff. These skill sets need to be based on specific work roles as well as generic teaching and assessment skills.
- More active collaboration between universities and the VET sector will yield better teacher training and professional development.

Note: This publication was produced through the NCVER Core Research Program; see page 58 for details.
Professional development in the vocational education and training workforce

Hugh Guthrie

This paper is based on one prepared for South Australia’s Training and Skills Commission. It comes at a time of strong interest in the quality and professionalism of the vocational education and training (VET) workforce. This interest is underpinned by research into what constitutes quality teaching, as well as initiatives such as the strategic audit of the Certificate IV in Training and Assessment under the auspices of the National Quality Council.

Guthrie argues that professional development is just one approach to improving the quality of the VET workforce. A strong professional culture in the workplace and better approaches to recruitment, job design, industrial relations and workplace and performance management also need to play their part. Whatever the approach, professional development needs adequate resourcing if it is to be effective.

Guthrie does not shy away from two areas surrounded by controversy—the Certificate IV in Training and Assessment and the registration of VET practitioners. On the former, Guthrie’s view is that the certificate IV is a sound qualification as long as it is taught well and adequate support is provided. On the latter, he opposes mandatory registration but notes that under the Australian Quality Training Framework it is possible to audit so that providers not only have staff with the necessary qualifications and skills profile but also have an ongoing professional development program in place that helps the organisation run—and improve—its core business of teaching and learning. Perhaps these audit requirements should be particularly rigorous for providers issuing teaching qualifications.

Note: NCVER consultancy work funded through the Department of Education, Employment and Workplace Relations; see page 58 for details.
There has been a continued interest in the numbers and characteristics of those who make up the vocational education and training (VET) sector’s own workforce. To address this, the Department of Education, Employment, and Workplace Relations (DEEWR) commissioned the National Centre for Vocational Education Research (NCVER) to undertake three projects, updating previous work (NCVER 2004). Each project generated a report which is included in this compendium:

- The first report, ‘Getting the measure of the VET professional: an update’, draws on analyses of Australian Bureau of Statistics (ABS) data from the Survey of Education and Training (SET) and the Census of Population and Housing to provide an updated demographic profile of VET professionals and VET practitioners.
- The second report, ‘National TAFE workforce study 2008’, provides national data on the TAFE workforce in 2008 and, where possible, compares this with 2002 data.
- The final report, ‘VET workforce collection: feasibility report’, considers what needs to be known about the national VET workforce and what options are available for collecting that information.

The reports confirm the difficulty of getting accurate information and numbers for the VET workforce at present. We know little about the movement into and out of the sector and the career paths of VET staff. Nor do we understand much about the qualifications—teaching and vocational—VET staff hold. This type of information is important if there is to be a national approach to building a more ‘professional’ VET workforce.

Note: This publication was produced through the National Vocational Education and Training Statistical Program; see page 58 for details.
Dustman, milliner and watchcase maker: skilling Australia

Francesca Beddie

This paper was presented at the Professional Historians Association (NSW) Islands of History conference held on Norfolk Island in July 2010. It sought to inject a policy perspective into the practice of history by demonstrating how an examination of the past can enhance understanding of current issues, in this case the role of skilled migration in meeting the needs of Australia’s labour market. It argues that a reliance on overseas workers to address skills shortages has been present ever since the first white settlement of Australia. This has, in turn, shaped attitudes to the governance of vocational education, in particular the notion of an industry-led system.

It was not until the late 19th century that the state started a concerted effort to develop the institutional structures to support local skills development, but even then employers were prone to look abroad for skilled workers. On the other hand, the organised labour movement was concerned from early on about the perceived threat to their jobs of imported labour.

In 1988 economic historian Stephen Nicholas and his colleagues undertook a statistical analysis of the convicts who came to New South Wales. Theirs was an important reinterpretation, taking a human capital approach to consider the contribution of convicts and arguing that these were healthy, literate working-class people who brought necessary skills to building the colony.

This paper sets out some ideas that may warrant further investigation by historians, in order to flesh out the story of Australia’s skilled migration in the 19th century and how this has influenced the development of Australia’s vocational education. It will accompany an historical timeline and timeseries data, which NCVER is compiling to help inform contemporary policy development.

Note: This publication was produced through the National Vocational Education and Training Research and Evaluation Program; see page 58 for details.
Crediting vocational education and training for learner mobility

Sandra Walls, John Pardy

Despite the rhetoric that encourages ‘seamless pathways’ from vocational education and training (VET) to higher education, many barriers exist for VET students who wish to undertake further study at university.

Movement from VET to higher education takes place on a spectrum ranging from well organised to haphazard. Students are not always granted full credit for their previous learning, and there is a lack of clarity between institutions about what counts as credit transfer or exemption.

This project investigates the concept of learning pathways, using as an example the localised credit arrangements that exist in degree structures at Deakin University and the partnerships between Deakin and three TAFE institutes—Box Hill, South West and the Gordon Institute.

By way of comparison, the authors also explore pathway arrangements available to individuals who have undertaken training through enterprise-based registered training organisations.

Key messages

- Different VET qualifications result in different pathways with varying credit transfer arrangements and outcomes.
- Students who are perceptive and well informed show that they are adept at forging pathways for themselves, in spite of systemic and cultural impediments.
- TAFE and university personnel identify improved pathway negotiations, a database of credits, and mutual respect as important for efficient credit transfer processes.
- The majority of employment and context-related training delivered by enterprise registered training organisations goes unrecognised in broader credit transfer and articulation policy discussions.

A short publication, A guide to credit transfer, has also been developed to assist students with VET qualifications who seek articulation into higher education programs <http://www.ncver.edu.au/publications/2248.html>.

Note: This publication was produced through the National Vocational Education and Training Research and Evaluation Program; see page 58 for details.
Mixed-sector tertiary education: implications for self-accrediting and other higher education institutions

Gavin Moodie

‘Mixed-sector’ institutions are relatively new in Australia, but numbers are likely to increase as the boundaries between vocational education and training (VET) and higher education become increasingly blurred.

In 2009 the National Centre for Vocational Education Research (NCVER) published research examining the nature of higher education offered by public VET providers (Higher education in TAFE by Leesa Wheelahan, Gavin Moodie, Stephen Billett and Ann Kelly*).

Gavin Moodie and his colleagues are continuing their research and this paper has been written with the intention of provoking discussion. It presents an initial account of mixed-sector tertiary education in Australia—separating institutions accrediting their own higher education programs, most of which are large public universities, from other tertiary education institutions, primarily smaller private providers.

A range of issues about the emerging character of mixed-sector provision is flagged and will be considered as part of the research, including:

■ How relevant will the sector designations be if the distinctions relating to tertiary education continue to blur, and if Australian governments allocate public support for teaching by mechanisms that do not distinguish between types of institutions?

■ To what degree is mixed-sector provision affected by the extent to which the smaller sector is integrated with an institution’s organisational structure, the level of the organisation at which vocational and higher education are integrated and the level of autonomy granted to organisational units?

■ What are the implications of mixed-sector provision for the students, staff and institutional futures?


Note: This publication was produced through the National Vocational Education and Training Research and Evaluation Program; see page 58 for details.
Annual transitions between labour market states for young Australians

Hielke Buddelmeyer, Gary Marks

Much analysis of youth transitions focuses on the first year after education, or outcomes at a specific age. Such work looks, for example, at the effect of education on the likelihood of being employed or unemployed.

This study takes a different angle by considering the effect of education on the persistence of labour market outcomes. For example, leaving school before Year 12 may be associated with high levels of unemployment, but the question is whether such a person is less likely to remain in employment once he or she has a job, compared with people with better educational qualifications.

Specifically, this study examines the role that post-school qualifications play in the annual transitions between labour market states for young Australians, and is based on the 1995 cohort of the Longitudinal Surveys of Australian Youth (LSAY). The labour states that were examined were: permanent employment; casual employment; unemployment; and not in the labour force. The effect of personality traits and ability on labour market transitions was also examined.

We know that having post-school qualifications, particularly higher-level qualifications, increases the chances of permanent employment, and the study confirms this. However, by focusing also on the occurrence of persistent labour market states, this work generates new insights. The study finds that the most persistent labour market states are casual employment for men, while for women it is being out of the labour force. Having at least a certificate IV for women or a bachelor degree or higher for men provides a buffer against undesirable labour market states, such as unemployment or being out of the labour force, becoming persistent.
The incidence and wage effects of overskilling among employed VET graduates

Kostas Mavromaras, Seamus McGuiness, Yin King Fok

When the skills workers have to offer do not balance with the skills jobs require, mismatch occurs.

Using data from the Household Income and Labour Dynamics in Australia (HILDA) survey, this study examines the extent to which workers can use their skills and abilities in their current jobs. The authors refer to the situation when a worker perceives that their job does not use all their skills as ‘overskilling’. The persistence of overskilling is a particular focus.

Overskilling can be distinguished from overeducation. The former is based on perceptions that skills are not used in a job, while the latter refers to people working in a job that does not require their level of education. While the concepts are related, they do differ; for example, early school leavers can be overskilled if they work in particularly unskilled jobs, but they could not be described as overeducated.

Mavromaras and colleagues find that, by comparison with workers with no post-school qualifications or with university qualifications, those with vocational qualifications at the certificate III or IV level are less likely to experience overskilling, and if they do, they suffer fewer adverse consequences, such as periods of unemployment.

Key messages
- Overskilling is, on average, most prevalent among those who are poorly educated. This is because poorly educated people end up in the most unskilled jobs.
- While overskilling is associated with lower educational levels, it does occur among those with post-school qualifications. And in their case it has worse consequences.
- The negative effects of overskilling are greatest for those with diplomas and degrees; persistence of the skills mismatch and of associated wage penalties is highest for the overskilled with a diploma or degree.

The finding that overskilling occurs among highly educated persons, and is persistent, suggests that individuals investing in education need to be aware of the range of possible outcomes—not everyone gets a high return.

Note: This publication was produced through the National Vocational Education and Training Research and Evaluation Program: see page 58 for details.

The incidence and wage effects of overskilling among employed VET graduates can be found on NCVER’s website: <http://www.ncver.edu.au/publications/2231.html>
The role of VET in preventing the scarring effect of youth joblessness

Hielke Buddelmeyer, Nicolas Hérault

Up until the Global Financial Crisis in late 2008, youth unemployment in Australia had been at its lowest recorded level since the 1970s. However, at just over 8%, this was still twice the rate for all people. Following the downturn, unemployment rates for those aged 15–24 years have increased to around 10%, a figure still twice that for all people. Young people are more vulnerable to potential unemployment as they are new entrants to the labour market. Unemployment becomes particularly problematic if it increases the chance that the individual is more likely to be subsequently unemployed.

Using data from the 1995 and 1998 cohorts of the Longitudinal Surveys of Australian Youth (LSAY), this report examines the extent to which a previous period of unemployment determines current unemployment. If unemployment can be attributed to an earlier spell of unemployment, we describe that earlier event as having a ‘scarring effect’. The period of investigation is 2001–06. The two cohorts are used to investigate if and how scarring differs between cohorts facing different labour market conditions. Given that having no or low skills and qualifications can contribute to unemployment, the authors also examined the extent to which post-school educational qualifications can mitigate the adverse impacts of the scarring effect of a period of unemployment.

Key messages

- Scarring effects, in terms of prior unemployment playing a role in subsequent unemployment, do exist. However, they diminish as time since being unemployed passes, and no scarring occurs after a year in employment.
- In general, having a post-school qualification, at any level, will lessen the scarring effect of unemployment. For the older cohort, but not the younger cohort, completion of a recognised post-school VET qualification does appear to offer protection against scarring.
- Scarring effects are more pronounced in females than in males and for the younger (1998) cohort. A stronger tendency for women to have a series of jobs of shorter duration, and, for the younger cohort, a lesser number of years to gain work experience, are plausible explanations.
- The probability of being unemployed in any given month does reduce during the period 2001–06, more likely due to the members of the cohorts gaining greater work experience.

Note: This publication was produced through the National Vocational Education and Training Research and Evaluation Program; see page 58 for details.
Skilling and reskilling for our (greener) future

Tom Karmel

This paper was presented at the Economic and Social Outlook Conference, 5–6 November 2009, at the University of Melbourne. It takes a sceptical view of the push for ‘green skills’, arguing that skills required in the labour market evolve relatively slowly, and that the way business operates is driven by changing costs, new technologies and new regulations, with sustainability being only one of many factors.

In addition, the presentation provides some data on ‘sustainable’ courses in tertiary education and then looks at three areas which have implications for the public investment in education and training: the levels of skill acquired through apprenticeships and traineeships, the pay-off to undertaking VET qualifications, and the role of diplomas in the labour market.

Note: This publication was produced through the NCVER Core Research Program; see page 58 for details.
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- **LSAY Research Innovation and Expansion Fund Program**
  The Longitudinal Surveys of Australian Youth (LSAY) Research Innovation and Expansion Fund (RIEF) has been established by the Department of Education, Employment and Workplace Relations to provide researchers with the opportunity to undertake projects using LSAY data and also serves to widen the community of LSAY data users. The work undertaken through RIEF complements the broader LSAY analytical program.

- **National Vocational Education and Training Research and Evaluation Program**
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- **National Vocational Education and Training Statistical Program**
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- **NCVER Core Research Program**
  NCVER’s inhouse research and evaluation program undertakes projects which are strategic to the vocational education and training sector. These projects are developed and conducted by NCVER’s research staff and are funded by NCVER.

- **NCVER consultancy work**
  Through its commercial arm, NCVER provides professional research, development and implementation services to Australian and international clients. These projects are funded by the client and some of these are made publicly available with client approval.
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