SUPPORT DOCUMENT

Pathways from rural schools: Does school VET make a difference? – Support document

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This document was produced by the author(s) based on their research for the report *Pathways from rural schools: Does school VET make a difference?*, and is an added resource for further information. The report is available on NCVER's website: <http://www.ncver.edu.au/research/proj/nr1028.pdf>

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Executive summary

Project scope, objectives and methodology

This study is particularly interested in school to work transition pathways for rural youth, who have for some years been disadvantaged in terms of participation in post secondary education, and in terms of employment outcomes. The project focusses specifically on youth transition through participation in school VET programs, which have expanded rapidly in Australia in recent years. It aims to fill a gap in our knowledge of the transition pathways of rural youth through school VET programs.

The research seeks to provide evidence of the medium-term outcomes (some two to three years after leaving school) for youth and their communities of VET programs delivered by rural schools. Specifically, the aims of the study are to investigate the extent of linkages between rural youth's participation in school VET programs, participation in post-school VET courses, labour market status, and retention in their local communities. It also aims to identify the features of rural school VET programs that enhance skills acquisition, influence rural youth's participation in post-school VET courses, and influence the ability of rural youth to secure local employment within their chosen industry area.

The study surveyed former Year 11, 12 and 13 school VET and school non-VET students from six rural school clusters funded by the Enterprise and Career Education Foundation, using a mailed questionnaire. Approximately equal numbers of VET and randomly selected non-VET students from each cluster were surveyed. The response rate of just over 20% (270 responses) varied according to school cluster, with similar response rates overall for VET and non-VET students, and for males and females. It is therefore a relatively small scale study, comprising a self-selecting sample that may not be representative of the 1998 cohort of school VET and non-VET students in rural schools, and this needs to be borne in mind when interpreting results from the study. Survey data were supplemented by written documentation from schools regarding the purpose, nature and outcomes of their VET programs, and were analysed with the aid of SPSS quantitative data analysis software.

Key findings

The key findings include those that relate to the *features* of rural school VET programs that contribute to successful outcomes, and to the *outcomes* themselves in terms of education and training, employment and rural youth retention/community development for both rural school VET and non-VET students.

Features of school VET

The features of rural school VET programs that appear to influence post-school education and training, employment and community outcomes include the purpose of the school VET program, work placements, and course industry area. Student motivation and gender influence outcomes for individual students.

School VET students in a cluster with the purpose *pathway to local employment* had the most distinctive outcomes and were more likely to report that their school VET course influenced their decision to continue with senior secondary school, helped improve their literacy and numeracy skills, and led to a job in the same or similar industry area. Those undertaking school VET program with this purpose and who participated in a work placement were also more likely to have received an offer of a job or an apprenticeship/traineeship through their work placement, and to have stayed in their home community.

Over half of all school VET respondents in this study participated in a work placement. Completion of a work placement appeared to be a pathway to initial employment on leaving school, in that half the work placement students were offered employment by their employer. Specifically, females were more likely to receive offers of employment from their work placement and males were more likely to receive offers of an apprenticeship/traineeship. Work placement students were less likely to have completed Year 12 than other school VET students. About a third of work placement students who were offered a job or apprenticeship/traineeship while still at school appear to have accepted the offer and left school early. Despite half of the work placement students receiving a job offer from their employer, at the time of the survey two to three years after leaving school, work placement students were no more likely to be currently employed full-time or to have commenced an apprenticeship or traineeship than other school VET students. However, work placement students were more likely than other school VET students to have obtained employment in the same industry area as their school VET study.

Regarding student motivation for undertaking a school VET course, those who indicated they did school VET for career reasons displayed the most distinctive outcomes. They were more likely to do a work placement and for this to have resulted in an offer of an apprenticeship or traineeship; less likely to finish Year 12, and more likely to go on to post-school education and training than other school VET students.

There were also clear gender differences in the choice of school VET courses. Females were more likely to choose business and clerical and work skills courses. Males were more likely to choose technology and trades, and primary industry courses.

Education and training outcomes

Eighty-five per cent of all respondents (school VET and school non-VET students) had commenced post-school education or training, including through a traineeship or apprenticeship. School VET students were less likely to continue with post-school education and training in general, but more likely to go onto further *vocational* education and training than school non-VET students. Interestingly, school VET females' post-school education and training participation pattern was more similar to that of males (VET and non-VET) than to that of female non-VET respondents.

Over one-third of all respondents (school VET and school non-VET) had commenced an apprenticeship or traineeship since leaving school, but school VET students were no more likely to enter apprenticeships/traineeships after leaving school than school non-VET students. Regardless of whether they did school VET or not, far more males than females went onto apprenticeships. There was also a gender difference in choice of apprenticeship and traineeship fields, with males principally choosing technology and trades, followed by primary industry and human services, while females mainly chose business and clerical, and human services.

Over half of the post-school education and training courses undertaken were in the same broad industry area as the school VET course, with 70% of apprenticeships and traineeships undertaken in the same broad industry area as the school VET course. The strongest links were in technology and trades, and human services, and the weakest in primary industries. Primary industries school VET students were the least likely to go on to any post-school education and training.

School VET courses were found to help students in developing specific, job-related skills, developing new ideas and in using information technology (IT) and new forms of technology. Female school VET students in particular reported benefits from learning to use IT and new forms of technology. Regarding credit for school VET courses, of respondents who indicated their further education and training was related to their school VET course, one-third had received advanced standing or credit. Those most likely to receive credit had undertaken school VET study in human services (mainly tourism and hospitality); those least likely to gain credit had studied in the business and clerical, and in the generic work skills, areas.

Employment outcomes

Eighty-nine per cent of all respondents (school VET and school non-VET students) were employed at the time of the survey, with school VET students in general no more likely to be currently employed than school non-VET students. However, school VET students were more likely to be involved in full-time employment than school non-VET students. In addition, male respondents in general were more likely to be involved in full-time employment than female respondents. All early school leavers, of whom the majority were school VET students, were employed.

Most jobs in the technology and trades area were full-time and taken by males, whereas the human services area was dominated by females in casual jobs. Of those school VET students currently working, 62% indicated that their job was in the same broad industry area as their school VET course. The industry area with the strongest link was human services, and with the weakest link, business and clerical.

Community outcomes

At the time of the survey, two to three years after they had left secondary school, 80% of respondents normally resided in a rural area and 20% in a metropolitan area. Most students surveyed indicated their intention to live in a rural community at some stage in their working life, with school VET students more likely to intend to live in their home community, and in a rural area more generally. An analysis of community outcomes by gender indicated that female school VET students were the most likely, and female school non-VET students the least likely, to intend to remain in their school locality. Male school VET students were the most likely to move after leaving school, closely followed by female school non-VET students who were the most likely to move to metropolitan areas for university study.

School VET respondents who intend to live in a rural area during their working life were more likely to have studied a school VET course in technology and trades, primary industry, or work skills, rather than business and clerical or human services. They were less likely to continue with post-school education and training in general, but more likely to go onto further vocational education and training, compared with school non-VET students who intend to live in a rural area.

Regarding local employment, female students in general were no more likely to have a current job in a rural area than male students. Likewise, school VET students were no more likely to have a current job in a rural area than school non-VET students.

Conclusions and implications

The findings suggest that rural school VET courses are pathways to related education and training (and presumably careers, particularly in technology and trades areas) both for students who intend to live in a rural area during their working life, and for those who do not intend to join the workforce in rural Australia. This suggests there is an opportunity for VET programs in rural schools to assist in the transition from school to further education and training and careers for a wide range of rural students.

Specifically, school VET students were more likely than non-VET students to indicate their intention to live in a rural location during their working life. This suggests that school VET programs have special potential to develop skills for the future workforce of rural Australia. In addition, there are some indications that school VET in rural areas does make a positive difference in terms of employment for early leavers, and in terms of retention in the community for female school VET students.

Implications from the study include the need for further, longitudinal studies into the outcomes of rural school VET programs for individuals and communities. For VET systems there are implications in terms of the flexibility of primary industries pathways from school VET courses, and in terms of the provision of career-oriented school VET options for female students.

Introduction

Background to the study

Recent years have seen increased government and private sector attention to the facilitation of youth transition pathways from school to work. These initiatives are critical given that the initial study or work destination of school leavers in their first year out of school is most likely to affect their subsequent post-school outcomes (Abbott-Chapman, Easthope & O'Connor 1997). Those young people most at risk of not making a successful transition from school to work include early school leavers, and those who are employed in part-time work only, or who are unemployed or outside the labour force, in their first year out of school (Curtain 1999). A number of these students are from rural areas. This study is particularly interested in transition pathways for rural youth, who have for some years been disadvantaged in terms of participation in post-secondary education, and in terms of employment outcomes (Cunningham et al. 1992; Lamb, Long & Malley 1998; Lamb & Rumberger 1999).

The project focusses specifically on youth transition through participation in school VET[1] programs, which have expanded rapidly in Australia in recent years, from 26 500 students in 1995, to 169 000 students in 2001, with over 94% of all schools now involved in such programs (ANTA 2001a). This growth has been influenced by a variety of factors, including the decline in full-time employment opportunities for youth in the past decade or so (Roussel & Murphy 2000), and the introduction of the Youth Allowance in 1998. It is also part of Australia's broader focus on creating a more highly skilled and flexible workforce in order to respond to increasing international competition and the new global economy.

Very little research to date has focussed specifically the transition pathways of rural youth through school VET programs. In an earlier study by the researchers (Kilpatrick et al. 2002) there were indications that school VET programs in rural areas have contributed to youth retention at school, particularly youth at risk of early school leaving. There were also indications from the same study of a strong link between participation in a school VET program and local employment outcomes. The current study arose from the desire of the researchers to explore rural youth transition pathways further, by comparing the outcomes of participation and non-participation in school VET programs for rural students. With reference to other studies (for example, Fullarton 2001; Misko 2001; ECEF 2002), the researchers also planned to compare outcomes of participation in school VET programs for rural students compared with all school VET students.

In planning this research, the researchers perceived the need to consider new and expanded definitions of 'successful' school VET outcomes, in addition to existing, measurable outcomes such as course completion rates, and further education, training, and employment pathways. For example, is non-completion of a school VET course necessarily an unsuccessful outcome? Does the measurement of outcomes at different times in a person's post-school life yield different results, and how important is it for research to look beyond short-term outcomes to the longer-term benefits? Should outcomes be measured in terms of both individual and community-wide benefits? The current study is an attempt to address some of these issues.

[1] The term 'school VET' is synonymous with the term 'VET-in-schools' commonly in usage.

Purpose of the study

The research seeks to provide evidence of the medium-term outcomes (some two to three years after leaving school) of school VET programs delivered by rural schools for youth and their communities. Its overarching purpose is to assess the community impact of school VET programs in addressing rural community decline, and to make recommendations that will contribute to the development of the VET sector and to its impact on rural and regional Australia. Specifically, the objectives of the study are:

- ✧ To investigate the extent of linkages between rural youth's participation in school VET programs, participation in post-school VET courses, labour market status, and retention in their local communities.
- ✧ To examine the features of school VET programs delivered in rural schools that enhance skills acquisition, influence rural youth's participation in post-school VET courses, and influence the ability of rural youth to secure local employment within their chosen industry area.

Research questions

There are four key research questions and two sub-questions:

1 In rural schools, how do the further education and training outcomes of students who have participated in school VET programs differ from the outcomes of school non-VET students?

2 In rural schools, how do the employment outcomes of students who have participated in school VET programs differ from the outcomes of school non-VET students?

3 To what extent does participation in school VET programs influence youth retention in rural communities, compared with non-participation in school VET programs?

4 What are the features of school VET programs delivered in rural schools that influence young people's destinations in relation to post-school VET study, employment, and remaining in their local communities?
   - ♦ What is the nature and relative importance of skills (both generic and job-specific) gained from different industry area work placements?
   - ♦ What is the nature and relative importance of other features of school VET programs?

The school VET context

Central to research into school VET outcomes is an understanding of the context in which the system operates. From a historical perspective, vocational education within the secondary school system has existed for several decades, largely driven by state models of education (Malley, Keating, Robinson & Hawke 2001). However, the early 1990s saw the emergence of a new phase of vocational learning in schools, as part of broader vocational education and training (VET) changes. During this time senior school curriculum options were broadened to include a range of general education and vocational programs, in order to facilitate the transition of young people from school to work. Traditionally, school VET programs were targeted at lower achievers, with a clear distinction between general and vocational pathways. However, policy at a national level (MCEETYA 1999) and endorsed by the states facilitated the provision of school VET courses to all students. Consistent with this, Fullarton (2001) has identified a gradual change in the profiles of students participating in school VET programs, emphasising that such programs provide an opportunity 'for all students to participate in a broader curriculum that includes applied contextual learning' (Fullarton 2001, p.4).

The growth of school VET, particularly since 1997, is closely linked to government support. In particular, it 'has been driven by Commonwealth policy and funding initiatives' (Malley, Keating, Robinson & Hawke 2001, p.20), including the allocation of specific seed funding to schools for the implementation of school VET programs, at the rate of $20 million per year for the five-year period 1997–2001 (ANTA 2001a). The continuation and further development of the sector is ensured, with a similar level of funding plus indexation allocated for the period 2002–2004 (ANTA 2001a).

Perhaps the most significant development to affect school VET has been the move towards a national focus for the delivery, assessment and accreditation of all VET. This culminated in the introduction of the National Training Framework in 1998, and the gradual implementation of training packages, which represent nationally endorsed and recognised standards and qualifications for skill recognition and assessment for a number of industry areas (ANTA 2001b). Nationally recognised qualifications for VET study (including school VET) are defined by the Australian Qualifications Framework (AQF).

The movement towards a national approach to school VET has seen an increasing partnership between the Commonwealth Government and state governments to develop policy and implementation guidelines, represented by the *New Framework for Vocational Education in Schools* (MCEETYA 2001). At a federal government level, key stakeholders in the provision of school VET include the Department of Education, Science and Training (formerly the Department of Education, Training and Youth Affairs), the Australian National Training Authority (ANTA), and the Enterprise and Career Education Foundation (formerly the Australian Student Traineeship Foundation). Stakeholders at the state and territory level include departments of education and secondary assessment boards, while at the community/regional level stakeholders include schools, business/industry groups, local government, and area consultative committees (Malley, Keating, Robinson & Hawke 2001).

Efforts to coordinate the delivery and assessment of school VET courses on a national basis are continuing, although there are still differences between states/territories in that 'individual States have differently embedded vocational programs into school curriculum, certificates and tertiary entrance systems' (Malley, Keating, Robinson & Hawke 2001, p.20). This situation is currently under review by state/territory departments of education, which are at varying stages of drafting and implementing new policy to address these issues. The current study focusses on students who undertook school VET programs in 1998 in the six Australian states, and a summary of the key features of those state systems from 1998 to the present, including planned changes to ensure a national approach, is provided in appendix B (Summary of state school VET systems). It is important that findings from the current study are interpreted with reference to this contextual information.

Definition of school VET

For the purposes of this study, school VET courses will be defined as those which result in, or lead to, a nationally recognised vocational education and training (VET) qualification (usually AQF accreditation in terms of a Certificate or Statement of Attainment). As Knight and Nestor (2000) note, usually school VET programs provide dual accreditation (the State Senior Secondary Certificate and a VET qualification), although this is not always the case (see appendix B Summary of state school VET systems). Some courses may be stand-alone VET programs, while others may be embedded within the school curriculum. School-based new apprenticeships (previously school-based apprenticeships and traineeships), which allow young people 'to participate in a wage-based contract of training with an employer and continue with studies of school leading to a school completion certificate' (Malley, Keating, Robinson & Hawke 2001), are also included as school VET programs, for the purposes of the current study.

While not all school VET courses involve structured work placements, many do. Such courses are referred to by various names, including school industry programs, and structured workplace learning. Many of these lead to advanced standing in an apprenticeship or traineeship (Knight & Nestor 2000). However, traditional work experience programs common in most Australian secondary schools in Years 10 or 11 are not included in the definition of school VET courses, as there is no formal assessment or VET accreditation of skills learnt.

Methodological outline

A detailed description of the methodology is provided in the Methodology section of this report. Briefly, the study attempted to answer the research questions by surveying school VET and school non-VET students from six rural school clusters (one from each state). The study targeted young people who were in Year 11, 12 or 13 in 1998. Survey data were supplemented by written documentation from schools within the cluster regarding the purpose, nature and outcomes of their VET programs or, where written documentation was not available, by verbal information from school principals or school VET coordinators. Survey data were analysed with the aid of SPSS quantitative data analysis software.

Contribution made by this research

This is a pilot study with a small sample size, and it is expected that it will give rise to subsequent research into the outcomes of school VET programs in both rural and urban areas. It is expected that knowledge gained from this study may be used by relevant industry and education bodies to inform the design, content and delivery of VET programs in rural schools, and by policy makers to inform decisions in relation to the provision of vocational education and training services in rural communities. An awareness of the inter-related social and economic outcomes of school VET programs in rural communities is likely to increase the collaborative efforts of government and private sectors, and ensure better use of limited funding and resources, as they address issues in relation to rural youth and rural community sustainability, including the 'brain drain' of rural youth to the cities.

Structure of the report

The literature on outcomes of school VET programs is reviewed in chapter 2. Chapter 3 presents a full description of the research methodology. In chapter 4, the results are presented and discussed, and links with existing research on school VET outcomes are identified. Conclusions and implications are presented in chapter 5. The report concludes with appendices that include additional data tables; a comparison of the six state school VET systems; three case studies of school VET pathways in the Tasmanian, South Australian and Western Australian clusters; and a copy of the survey questionnaire and related documentation.

Literature review

Introduction

This chapter will review the available research on the outcomes of school VET programs. Because very little research is available specifically on the outcomes for rural students compared with urban students, the chapter will overview school VET outcomes for students in general. It will cover three main groups of outcomes: further education and training, employment, and other outcomes (including outcomes in relation to personal development, as well as community-wide benefits). The chapter will then conclude with an overview of existing research into VET programs in rural schools, including a comparison of outcomes for rural and urban students, where available.

Measuring the effectiveness of school VET programs

Measuring outcomes by participation and completion rates

It has been common practice for various state departments of education, and for educational institutions involved in the delivery of school VET, to conduct regular surveys into participation and completion rates, as a way of measuring the growth and effectiveness of their programs. Examples include studies completed by the Education Department of Western Australia (1997, 1998, 1999). These data indicate the strong growth of school VET programs in that state from the mid 1990s, with increasing numbers of students and schools becoming involved, thus justifying government expenditure. Similar growth is reflected in other states/territories. For example, in Western Australia, the percentage of Year 11 and 12 students involved in school VET programs increased from 2.8% in 1996 to 25.5% in 1999 (Education Department of Western Australia 1999). Studies such as this indicate a growth of school VET programs in certain industry areas, particularly in tourism and hospitality, business and clerical, engineering and mining, and primary industries (Education Department of Western Australia 1999). However, these studies are limited in that they do not capture the range of outcomes from participation in school VET programs, and for this data, we need to turn to student destination surveys.

Measuring outcomes by student destination surveys

Destination surveys tend to fall into two categories: short-term and medium to longer term. Short-term studies (see, for example, Polesel, Teese & O'Brien 1999a; Misko 2001; ECEF 2002) are often undertaken by individual schools as well as other bodies involved in funding school VET programs, usually surveying students in the year after they completed school, and quite often in the first half of that year. It is not usual for these studies to continue to monitor the progress of former students beyond this initial contact. Other destination surveys, some of which have been undertaken by bodies such as the Australian Council for Educational Research (ACER), the Department of Education, Science and Training (DEST, formerly known as DETYA), and some university departments, have tended to track student outcomes for two or more years after students have left school (see, for example, Polesel, Teese & O'Brien 1999b; Ball & Lamb 1999–2000; Fullarton 2001). Although both types of destination surveys indicate links between completion of a school VET course, and further study and employment outcomes, they differ in the proportion of school leavers involved in these activities. This suggests that the findings from both types of destination surveys need to be considered together, in order to gain a more comprehensive picture of the influence of school VET programs on students' later pathways.

In the next section, the key education and training, and employment outcomes of participation in school VET programs will be reviewed, with reference to both short-term and medium-term destination surveys. It needs to be noted that comparison between these studies is difficult, and in a number of cases no attempt is made to compare findings. This is because the studies have used different student cohorts and methodologies, and differing ways of categorising and reporting data (for example, some studies include apprenticeships as employment, and others include them as further education and training). Therefore, comparison in these instances would be confusing. In addition, one of the limitations of much of the existing research is the lack of comparison between outcomes for school VET and school non-VET students, therefore care needs to be taken in attributing causality to participation in a school VET program.

Outcomes from school VET participation

Outcomes related to further education and training

Findings from Polesel, Teese and O'Brien (1999a) indicated that, of Victorian students who had completed a school VET course in 1998 and who were surveyed in their first year out of school, just over 50% had gone on to further study, comprising 20% to university and just under 30% to TAFE. Reasonably similar findings have been reported by other studies (see, for example, Polesel et al. 1998; Gordon Institute of TAFE 2000a). However, Polesel, Teese and O'Brien (1999b) surveyed a different cohort of students in their second year out of school, and found that fewer were involved in post-school study compared with those in their first year out of school (Polesel, Teese & O'Brien 1999a). This finding is linked to that of Fullarton (2001), who reported a decrease in full-time TAFE and university study in the second year out of school, although Fullarton concedes that this decrease may be due to completion of one-year certificate courses.

Of particular interest from the Polesel, Teese and O'Brien (1999a) study was the comparison of further study outcomes for school VET and non-VET school leavers with low levels of academic achievement. It was found that the school VET low achievers were more likely to progress to further study than non-VET low achievers. For example, progression rates to TAFE were 11% higher for school VET low achievers than for non-VET low achievers.

Recently published national destination surveys by the Enterprise and Career Education Foundation for cohorts of school leavers from 1999 (Misko 2001), 2000 (ECEF 2002) and 2001 (work-in-progress) provide an important source of data. These students were surveyed during their first year out of school. For the first two studies (Misko 2001; ECEF 2002), the researchers reported that approximately 40% of school VET students had continued with post-school study, a figure lower than that reported by Polesel, Teese and O'Brien (1999a). Preliminary findings from the third ECEF study, which is still in progress, reported a post-school study rate of approximately 45%, of which most were engaged in full-time study (Gembitsky, B., pers. comm. 17 July 2002). A comparison of these preliminary findings with Misko (2001) and ECEF (2002) suggests that in the last couple of years there has been a slight increase in part-time study rates and a slight decrease in full-time study rates, although it must be remembered that these are different student cohorts, which may partly account for these differences.

Longitudinal studies have provided some important medium-term data on school VET leavers. For example, in relation to further education and training outcomes, Ball and Lamb (1999–2000) found that a total of 53% of former school VET students from a 1990–1994 national cohort had subsequently undertaken further VET study, including apprenticeships, suggesting that school VET study is a pathway to post-school VET study. This finding supports earlier research by Lamb, Long and Malley (1998) and is consistent with later research by Fullarton (2001), who compared the outcomes of school VET with those of school non-VET students. The importance of Ball and

Lamb's (1999–2000) findings lies in the number of young people who gained an apprenticeship straight after finishing school—the figure was twice as high for school VET students than for other students. The strong link between school VET participation and later apprenticeships is also supported by Fullarton (2001).

Research indicates links between the type of school VET course undertaken, and the status and type of further education and training selected. Misko (2001), who surveyed school leavers in their first year out of school, reported that over half of the students who completed school VET and continued to TAFE reported they were studying a course related to their school VET program, and approximately one-quarter of university students reported a similar link. Progression to full-time study was linked to participation in school VET courses in areas such as information technology and tourism (Misko 2001). These findings were confirmed by ECEF (2002), who also noted that business/finance and arts/media school VET study is more likely to lead to full-time post-school education and training in the first year out of school, than to employment outcomes.

Despite the positive further study outcomes of participation in school VET courses, particularly in relation to further education and training in the VET area, Misko (2001) expressed concern that nearly half of the school VET students in her national study reported they had not gained credit transfer or advanced standing for further study in a related area, although 28% of apprentices and 38% of TAFE students did receive this benefit. These figures are lower than those from the study by Malley, Ainley and Robinson (2001), and, together with similar concerns expressed by Porter (pers. comm. 27 August 2002) in relation to the lack of flexibility of post-school pathways, suggest the need for further national research into the advanced standing and credit transfer pathways of school VET graduates.

Outcomes related to employment

A study by Polesel, Teese and O'Brien (1999a) of school VET students in their first year out of school found that some 40% were in employment, comprising 17.9% in apprenticeships or traineeships, 14% in full-time work and 7.4% in part-time work. Approximately 6% of respondents identified themselves as unemployed. Reasonably similar findings regarding post-school employment outcomes and unemployment levels for school VET students have been reported by several other studies (see, for example, Polesel et al. 1998; Gordon Institute of TAFE 2000a). Subsequent national research indicates that levels of participation in part-time work for school VET leavers are increasing, while full-time work participation rates are decreasing (ECEF 2002). Given the changing nature of labour market conditions, this increase in part-time work, and reduction in full-time work, is not surprising.

Slightly higher overall employment levels (approximately 50%) were reported by Misko (2001) and ECEF (2002), who surveyed school VET students in their first year out of school. One of the reasons for these higher employment levels relates to the nature of the survey sample. Misko (2001) and ECEF (2002) targeted school leavers who had participated in structured workplace learning (SWL) programs funded by the Enterprise and Career Education Foundation during Years 11 and/or 12, whilst most other studies focussed on all school VET courses, whether they had a workplace component or not.

Of particular importance to the current study is longitudinal research by Fullarton (2001), which compared outcomes for school VET and school non-VET students from the same student cohort. Highlighting the importance of comparative data such as this, Malley, Keating, Robinson and Hawke (2001) note:

> The validity of findings concerning outcomes for VET students also depends on the availability of comparative data for non-VET students' (p.49).

Fullarton (2001) confirmed a positive link between participation in a school VET program and later employment. She found that school VET students are more likely than school non-VET students to be in the workforce in the year after leaving school, and are far more likely to be working full-time compared with their non-VET counterparts (32% of all school VET students working full-time compared with 19% school non-VET students).

Although Misko (2001) did not have a school non-VET group for comparison purposes, she compared her findings regarding the employment (and unemployment) status of school VET participants with ABS statistics for the 15–19-year-old age group in general. She reached similar conclusions to Fullarton (2001), in that school leavers who had participated in a school VET course were more likely to be in full-time work than all other 15–19-year-olds, although again it needs to be remembered that Misko's study focussed only on students who had done a work placement as part of their school VET course.

Misko (2001) also noted that the rate of unemployment for school leavers who had participated in a school VET course with a work placement was lower than the national average for all 15–19-year-olds by about 4%. This finding was supported by the ECEF (2002) national study, which found the unemployment rate of 10% for school VET students who had undertaken work placements was substantially lower than the national average for 15–19-year-olds at that time, which was 17%. Interestingly, however, in a study in which school VET and school non-VET students from the same cohort were surveyed one year and two years out of school, Fullarton (2001) reported similar unemployment rates for both groups.

Research indicates that the link between school VET and employment extends and increases beyond the first year out of school. For example, in their second year out of school, students reported higher levels of participation in full-time work (26%) compared with students in their first year out of school (14%, reported by Polesel, Teese & O'Brien 1999a). Fullarton (2001) reported similar findings when comparing employment outcomes for students one year and two years out of school, and noted that the findings were consistent for both school VET and school non-VET students.

In terms of the links between school VET study area, and later employment status, Misko (2001) and ECEF (2002) found that students who had completed school VET work placements in areas such as automotive, building and construction, engineering and science, and primary industries were more likely to be in full-time work, including new apprenticeships (ECEF 2002).

Research has also identified links between the type of school VET course studied, and later employment in the same industry area. Positive links have been reported between school VET study and later employment in the same area, in relation to retail (Misko 2001), automotive (ECEF 2002) and primary industries (Ball & Lamb 1999–2000; Misko 2001; ECEF 2002). By comparison, fewer students who studied information technology school VET courses gained employment in the same area (Misko 2001; ECEF 2002). Some care needs to be taken when interpreting these findings, in that both the Misko (2001) and ECEF (2002) studies report short-term or point-in-time outcomes (that is, students were surveyed once, approximately three to four months after they had left school), so it is unknown whether the correlation between school VET and employment industry areas may change over time.

Outcomes/benefits of work placements

Work placements form an integral part of many, but not all, school VET programs, and the particular benefits of vocational work placements identified in the research will be discussed shortly. However, recent research by Smith and Green (2001) noted that valuable student workplace learning experiences also occur through work experience programs, and in particular, through students' part-time work while still at school. For example, their research found that 60% of students surveyed had formal part-time work while at school (including work in family-owned businesses), and that more females than males and more rural than urban students were involved. Students in Smith and Green's study averaged 8.5 hours part-time work per week while still at school. Although detailed discussion of work experience and part-time employment at school is beyond the scope of the current study, several of Smith and Green's (2001) findings are relevant: students report gaining both generic and specific skills best from paid work first, and then from vocational placements; and of the students who reported having undertaken a combination of work experience, vocational placement and part-time work at school, most reported transfer of learning between the different activities, most likely influenced by the fact that many of the students undertook the different activities in the same industry and with the same employer. These links, particularly between vocational placements and paid part-time work while at school, would suggest further research may be needed in this area.

In terms of the particular value of the work placement component of school VET program in accessing later employment, Misko's (2001) study reported that approximately one-third of students who gained employment in the same industry as their SWL program, returned to work for their SWL employer. Although this study included both work experience and vocational placement students, the majority who reported employment outcomes were vocational placement students. In a subsequent study, ECEF (2002) also noted the link between work placements and later employment, in that 45% of those currently in employment who had undertaken a work placement in a particular industry sector, were employed in that same industry sector.

The link between participation in work placements and employment outcomes in the VET sector is supported by recent British research into the outcomes of work placements for higher education students (Blackwell, Bowes & Harvey 2001). This study found that not only do work placements give rise to higher employment rates, but they were also responsible for positive student perceptions of the learning experience. Interestingly, Blackwell, Bowes and Harvey (2001) found that students were more likely to appreciate and be able to identify the benefits of work placements in retrospect, often several years after they had completed their studies, rather than when they were still undergraduates. This issue is also raised by Smith and Harris (2000), who note the lack of follow-up research with school VET students several years after they have completed school, in order to determine the medium to longer term benefits of their work placements.

Teese, Davies and Ryan (1997) reported a link between student profile and the outcomes gained from work placements. They found that students most likely to participate in work placements, and most likely to find them valuable, were those with lower levels of academic achievement. They also found that the students who benefited most from work placements were those who would be looking for employment on completing school because of the focus on the delivery of competencies and job skills. Given this student profile, the link between work placements and subsequent employment reported by Misko (2001) and ECEF (2002) is therefore not surprising.

Several research studies have sought student perceptions of the value of work placements in helping them to make the transition from school to work (see, for example, Teese, Davies & Ryan 1997; ECEF 2002). Their findings accord with other research into work placements (see, for example, Misko 1998b, and the review of research into work placements by Smith & Harris 2000), which identified outcomes as including job skills, self-confidence, understanding the world of work, confidence in finding work, and the development of networks to help young people gain employment. Students in Misko's (1998b) study also reported increased self-confidence in dealing with others; increased knowledge about their suitability for specific vocations; and increased ability to cope with pressure, as outcomes of work placements. Supporting Misko's findings regarding the value of work placements, ECEF (2002) reported that 65% of the respondents who were currently employed and who had completed a work placement as part of their school VET course, indicated they had found their work placement helpful when choosing their job.

In particular, work placements have been identified as a key source of learning generic skills such as teamwork and communication (see, for example, Misko 1998b; Smith & Green 2001. It is interesting to note that of the 2285 students surveyed by Misko (1998b), the majority reported that the main area of learning in work placements was in the technical skills area (computer, general clerical, and machinery and equipment operation), followed by interpersonal or generic skills (team work and communication), and finally, by industry-specific skills (knowledge of particular trades or professions).

Other outcomes

In addition to further education and training, and employment, pathways, there is a body of research that focusses more specifically on the outcomes of school VET programs in building capacity—for individuals, schools and communities. This research is largely, but not exclusively, qualitative in nature. For example, a number of research studies (Misko, Campbell & Saunders 1998; Misko 1999; Kilpatrick, Bell & Kilpatrick 2001; Kilpatrick et al. 2002) identified increased self-confidence and self-efficacy of young people as key outcomes of school VET programs. For all young people, but particularly for those who are underachieving, increased self-confidence and self-efficacy is important, although, as Kane (1997, cited in Dumbrell 2000) notes, Australian research to date has tended to neglect this outcome. Kilpatrick et al. (2002) noted that self-confidence is increased as young people develop networks with employers and other adults in the community and feel valued as members of the community. Their study provided some evidence to suggest that increased self-confidence and its spin-off outcomes, together with the skills and knowledge gained from participation in school VET courses, contribute to youth retention in rural communities.

Some research has looked further than benefits for students, to highlight benefits of school VET programs for teachers, for employers, and for whole communities. For example, Cumming (1992) and Scharaschkin et al. (1995, cited in Frost 2000) reported that teacher benefits of participation in school VET programs included an increase in their knowledge and employment and industry needs, increased collaboration between teachers and students, and between teachers and other teachers, workplace trainers and supervisors, as well as high levels of teacher satisfaction. For employers, benefits of participating in school VET programs include promotion of their organisation within the community, the opportunity to encourage young people to consider a career in their industry, the establishment within some workplaces of a strong training culture, and the opportunity for employers to fulfil their community obligations (Figgis 1998). Kilpatrick et al. (2002) also found that school VET programs in small rural communities were a source of learning for those employers involved, particularly in the areas of leadership and management.

Perhaps one of the most interesting outcomes of school VET programs, identified by a growing body of research, relates to community development. Some of this research is Australian in context (see, for example, Cumming 1992; Misko 1998a and b; CRLRA 2000, 2001; Kilpatrick, Bell & Kilpatrick 2001; Kilpatrick et al. 2002), and much has also come from overseas, particularly North America (see, for example, Miller 1991, 1995; Lane & Dorfman 1997). Focussing largely but not only on rural communities, this research traces the way in which the development, maintenance and sustainability of school VET programs helps to build community social capital, by facilitating interaction between community members, and stimulating coordinated actions for the benefit of the whole community. Outcomes of this process of network building include increased levels of intergenerational trust, increased opportunities for lifelong learning, and more positive attitudes towards education and training in the community. It would seem that further research into the network-building outcomes of school VET programs is required, as existing research confirms that the development of new networks is essential for building community social capital (Falk & Kilpatrick 2000).

Factors influencing school VET outcomes

There are a number of factors that impact on the nature and extent of school VET outcomes, including state/territory differences, participant details such as ethnicity, Indigenous background, the effects of a disability, and gender, as well as early school leaving. ECEF (2002) indicated differences between the states, in terms of employment and participation in further education and training, for school VET leavers. For example, the highest proportions of school VET leavers in full-time work were in Queensland, New South Wales and Western Australia, while Victoria reported the highest rates of school VET leavers in full-time study, along with South Australia and Western Australia. To a large extent, however, these findings would seem to be reflective of labour market and general economic conditions within those states. Porter (pers. comm. 27 August 2002) also identified state influences on school VET outcomes. Her research-in-progress is a three-year longitudinal study looking at the effects of differing state policies surrounding recognition of school VET subjects for university entrance, and recognition in terms of credit for further VET study. Preliminary findings indicate that these policies are influential in either reducing or increasing the flexibility of student post-school pathways.

In terms of school VET participation and outcomes for Indigenous students, research highlights the fact that Indigenous students tend to be disadvantaged compared with non-Indigenous students. For example, statistics from the Australian Student Traineeship Foundation (now known as ECEF, and cited in Buckskin 2001) indicated that Indigenous students represented only 3.3% of the total number of students participating in structured workplace learning in 1999. In terms of outcomes, ECEF (2002) found that the percentage of Indigenous students who had completed a school VET program and were in full-time work, was lower than full-time employment rates for non-Indigenous students. This study also reported much higher rates of unemployment for Indigenous school VET students compared with the unemployment rate for all respondents.

Outcomes for students with a disability are also reported as lower than those for respondents in general, in terms of full-time work and full-time study rates, whilst unemployment rates are twice as high for students with disabilities compared with respondents in general (ECEF 2002). The marked differences in participation rates and outcomes for Indigenous students and those with a disability, suggest that further research is needed in each of these areas.

Two issues that have been the subject of continuing research on school VET participation and outcomes are the effects of gender and early school leaving, and these will be discussed in further detail in the following sections.

Gender issues

Regarding student destinations according to gender, ECEF (2002) found that males who completed a school VET course in 2000 were more likely to be in full-time work some three months after school completion, compared with female school VET leavers. This supports Fullarton (2001), who found that participation in school VET is more likely to be a pathway to the labour market for males than females. Interestingly, Fullarton (2001), who tracked the same student cohort for two years after leaving school, found that in the second year out, the pattern of male dominance in terms of full-time employment had been reversed, and that a higher percentage of females than males were in full-time work.

In terms of female outcomes, Lamb, Long and Malley (1998) reported that far more female school VET students continued with higher education than males (21% compared with 9%), and that far fewer female school VET students entered apprenticeships than males (2% compared with 22%). Regarding apprenticeships, Fullarton (2001) found the participation rate of males in apprenticeships increased in the second year out of school compared with the first year out (Fullarton 2001), while female participation rates differed little or decreased slightly between the first and second years out of school.

Fullarton (2001) and others reported gender differences in terms of subject choice in Year 12. For example, the main field of study for all males (school VET and school non-VET) was computer studies, and for school VET males, other areas included traditional male trades such as electrical and mechanical. Females (both school VET and school non-VET) tended to choose travel and tourism, and for school VET females, traditional female areas such as childcare, secretarial studies and hairdressing were also selected. The location and status of later employment was linked to these study areas. For example, Fullarton (2001) noted that of all students who were employed in the first year out of school, the three main employment areas were supermarkets, cafes and restaurants, and take-away food stores, and the status of employment in these areas was mainly casual and part-time, rather than full-time. Given these factors, Fullarton's (2001) report that 25% of all female school VET students were likely to be working in these areas, compared with 12% of all male school VET students, is not surprising.

Early school leavers

The literature in general indicates that early school leavers are at greater risk than school completers, in terms of their ability to enter and remain in the labour force (see, for example, Lamb & Rumberger 1999). Those most at risk tend to be male, are more likely to come from low SES backgrounds, are more likely to be low school achievers, and are more likely to live in rural and remote areas. In addition, there is a much higher rate of non-completion amongst Indigenous youth (Marks & Fleming 1999; Lamb, Dwyer & Wynn 2000; Fullarton 2001). Fullarton (2001) and others have also identified a link between early school leaving, low school achievement levels and perceptions of the school experience as being of little value, as represented by disengagement from, and dissatisfaction with, the system.

Interestingly, Searston (1996), in his study of student destinations in the Atherton Tablelands in North Queensland, found that completion of Year 12 did not carry an employment advantage for rural students who remain in their local rural community. The study indicated that, of those students who remained in their local community, early school leavers were just as likely as school completers to secure employment in the first year out of school. However, Searston noted that early school leavers were more likely to be disadvantaged in the medium to longer term, in terms of higher unemployment rates. In addition, the study found that early school leavers from rural areas were disadvantaged in terms of employment if they moved away from their local rural community to seek employment.

Searston's (1996) study refers to both school VET and non-VET students. However, research has also been conducted into school VET students who leave school before completing their course of study, and has identified a group of students who may not experience the negative labour market outcomes usually associated with early school leaving. This group includes the positive and opportune leavers, as opposed to the discouraged or alienated leavers (Dwyer 1996). Positive and opportune leavers typically leave at or near the end of Year 11 to take up employment offers, which are frequently the result of participation in the school VET program (Smith 1996; McCrae, K., pers. comm. 23 October 2001). Relevant to the current study is research that indicates school VET students from small rural towns may be more likely than students from larger rural and regional towns and urban centres to complete only one year of their school VET course (Year 11) before leaving to take up employment (Smith 1996).

Research into the outcomes of school VET early leavers (ECEF 2002) found that participation in at least part of a Structured Workplace Learning program yielded positive outcomes, at least in the short term. Non-completers of school VET programs reported higher rates of full-time work (41%) than completers (35%), although for all other categories (part-time work, full-time and part-time study, and unemployment) the outcomes for non-completers were less favourable than for completers. In another study, Misko (2001) reported little or no difference in the study and employment outcomes of completers and non-completers. However, it needs to be noted that both the Misko (2001) and ECEF (2002) data reflect short-term outcomes, in that they were collected in the year after leaving school, so the medium to longer term outcomes of these non-completers are unknown. However, these research studies suggest a need to reconsider the way in which outcomes for early school leavers are measured, consistent with Malley, Keating, Robinson and Hawke (2001), who identify a 'lack of appropriate performance measures, whereby prevailing school performance measures tend not to identify as successful outcomes, the placement of a student into a full-time job before completing Year 12' (p.8).

School VET for rural students: how much do we know already?

Research has shown that rural students are disadvantaged in terms of post-compulsory education opportunities because of their lower senior school retention rates (Cunningham et al. 1992; Lamb, Long & Malley 1998). In addition, post-secondary education is seen as less relevant by rural and isolated students, particularly if from lower and medium socio-economic backgrounds (James 2000), and has been found to be less valued by rural students than by urban students (Cunningham et al. 1992). James (2000) reported that rural and isolated students were more likely to leave school and take up work than their urban counterparts. Of those who opted to undertake further study, they were more likely to select TAFE rather than university. In addition, as highlighted in the Human Rights and Equal Opportunity Commission's *National Inquiry into Rural and Remote Education* (HREOC 2000), issues such as access and equity in terms of resources, facilities and opportunities have also impacted negatively on the post-compulsory education options of rural youth.

The introduction of school VET programs to rural schools, and their increasing rate of uptake (Frost 2000), would appear to be an important step in addressing these key areas of rural disadvantage, although there is only a small body of research within Australia that specifically focusses on VET in rural schools, or that compares the outcomes of school VET programs for rural and urban students. This lack of research into school VET programs in rural areas needs to be addressed, given that we know rural students are more likely to undertake a school VET course than urban students. For example, Ball and Lamb (1999–2000), drawing on Australian Youth Survey data for the student cohort from 1990–1994, reported that 16% of rural students undertook school VET courses compared with 11% of urban students. By 1998 participation rates by rural students, derived from the Longitudinal Surveys of Australian Youth, were reported as 26%, compared with 21% of urban students (Fullarton 2001). These findings are consistent with those of Malley, Ainley and Robinson (2001) who reported a higher rate of school industry programs in rural areas than capital cities. However, before moving on to consider the particular impact of school VET programs on rural youth and their communities, we first need to determine what is meant by the term 'rural'.

What do we mean by rural?

The literature indicates there is no 'typical' rural town, and that any measure of rurality needs to take into account several variables, including degree of isolation or remoteness, and population size. Degree of isolation is frequently measured by distance from services that would normally be found in larger regional centres, such as access to tertiary education (see, for example, James 2000). Population size is a key variable in a number of studies (see, for example, Smith 1996; Fullarton 1999). Some, such as Fullarton (1999), view rural towns as those with a population of less than 1000, and view communities with populations of between 1000 and 100 000 as regional towns. Others, such as Smith (1996), see a blurring of the boundaries between 'rural' and 'regional', and categorise study sites as small rural town (population 6000), medium rural town (population 21 000), and large rural town (population 56 000). Educational research in recent times has tended to view small rural communities as those which have populations of approximately less than 10 000 (Country Education Project Inc. and Youth Research Centre 2001; Kilpatrick et al. 2002), which accords with Smith's (1996) earlier categorisation. In addition, these studies have included other variables such as receipt of Country Area Program (CAP) funding as another determinant of the rurality of schools and communities, and another variable against which to analyse data.

Research suggests that findings tend to differ according to the degree of rurality (size of population; degree of isolation) of the community. For example, Smith (1996) noted that the outcomes of vocational work placements were different for students from small rural towns than for students from medium or large rural towns, or from metropolitan centres. And James (2000), commenting on the intended post-school options of senior students, reported that 'Student preferences for TAFE or work [as opposed to further study] increase as their distances from major urban centres and university locations increase' (p.17). This indicates that care needs to be taken in assessing the impact of school VET programs on rural students and communities, and that it is not possible to generalise findings to all rural communities.

Outcomes of school VET programs for rural youth and their communities

It seems reasonable to assume that many of the outcomes of school VET programs reported earlier in this review would relate to both urban and rural students, including further education and training, and employment outcomes, as well as personal development in terms of increased self-confidence and self-efficacy of students. In fact, as noted earlier, much of the recent research on youth self-confidence as a result of school VET programs has arisen from research in rural schools (see, for example, Kilpatrick, Bell & Kilpatrick 2001; Kilpatrick et al. 2002). However, the extent to which some rural school VET students are able to capitalise on employment and further study options may be more limited than for urban students, given the lack of employment and further education and training opportunities in many small rural communities. For example, Smith (1996), in a study of students undertaking the same school VET course in small, medium and large country towns, as well as in a metropolitan centre, found that a greater percentage of school VET leavers from the small rural town entered part-time rather than full-time work on leaving school.

Existing research into school VET programs in rural communities tends to focus on the general benefits of such programs in terms of school to work transition opportunities provided. For example, a study by Country Education Project Inc. and Youth Research Centre (2001) noted that:

> Experience has demonstrated that schools in rural and remote areas play a vital role in both the provision of VET programs and in the preparation of young people for transition from school into the VET sector (p.9).

Qualitative research such as this 'highlights the recognition by schools in small rural communities of the important contribution made by VET to meeting the diverse needs of their students' (Country Education Project Inc. and Youth Research Centre 2001, p.6). In particular, as the study notes, such programs have had a substantial impact on increased and more flexible education and training options in small rural communities. Not surprisingly, the increased ability of schools to provide a greater variety of learning opportunities for senior students through school VET programs has had a number of positive spin-offs for rural schools, in terms of improved school retention rates, and directly related to this, increased chances of small rural school viability (Kilpatrick, Bell & Kilpatrick 2001).

Research which details more specific outcomes for students of VET programs in rural schools includes a series of destination surveys conducted by rural schools themselves, and several other, largely qualitative, studies. For example, several recent destination surveys of school VET students in rural schools in Queensland and South Australia indicated a strong link between participation in the program, and employment outcomes (see, for example, Both 1999; Goondiwindi State High School 2000). Both (1999) reported that 72% of school VET students who had completed the Engineering Pathways Program at Millicent High School in South Australia in 1998 had gained local employment, and that 85% of all those who were employed had remained in their industry area. Higher employment rates were reported in a study undertaken by Goondiwindi State High School (2000) in Queensland, in that all students who had completed school-based traineeships were offered full-time local apprenticeships as a result. It needs to be noted that the school VET programs in both these communities were developed with the specific purpose of providing youth with local employment opportunities, and that such positive employment outcomes are not likely to occur in all rural communities. However, these studies do suggest that participation in school VET programs in these communities has contributed to youth retention by providing local employment opportunities.

Frost (2000) identified the benefits that have accrued to rural students and communities through increased uptake of school-based new apprenticeships in rural areas. Research by Country Education Project Inc. and Youth Research Centre (2001) supported Frost's claims, by noting that school-based new apprenticeships in particular had been found to be valuable in providing direct links to future farm and other rural employment. In particular, they cited positive examples of rural male students at risk of not completing school, participating in a new apprenticeship and using their family farm as the work placement. New apprenticeships provide expanded opportunities for student development through work placements, and offer current information on career and training opportunities for school staff (Frost 2000). For industry, Frost (2000) notes that new apprenticeships provide recruitment opportunities for trainee staff and part-time student employees, as well as the opportunity to impart work readiness skills and attitudes to young people.

Not all the beneficiaries of rural school VET programs are young people. Kilpatrick, Bell and Kilpatrick (2001) reported on the outcomes for adults in small rural communities who participate in school VET courses. Some of these were young adults with low literacy, numeracy and social skills, who would not have been well catered for by the institutional setting of TAFE. Others were farm workers, who were unable to afford the time or expense of travel to a large regional centre to further their VET studies. For these people, school VET programs helped to build their confidence and provided lifelong learning opportunities, which may otherwise have been denied them. Kilpatrick, Bell and Kilpatrick (2001) also reported that where local adults participated in school VET programs, attitudes to education and learning within the community improved.

As reported earlier, a number of studies have identified the rural capacity building outcomes of school VET programs, including increased levels of intergenerational trust (Smith 1996; Kilpatrick, Bell & Kilpatrick 2001; Kilpatrick et al. 2002), and for youth, an increased sense of belonging and acceptance. These outcomes have important social implications, particularly given the relatively high suicide rate of rural youth compared with their urban counterparts (Smith 1996). Smith noted that school VET programs in rural communities facilitated the building of networks within the community, between students and local employers, employers and students' families, and between the participating businesses themselves. Other research into the role of rural school VET programs in building community social capital supports this finding (Cumming 1992; Miller 1995; Lane & Dorfman 1997; CRLRA 2000, 2001; Kilpatrick, Bell & Kilpatrick 2001; Kilpatrick et al. 2002).

Factors which impact on the effectiveness of school VET programs in rural communities

Research has shown that successful employment outcomes of school VET programs in rural schools depend to some extent on the industry base and economic wellbeing of the community and region, factors often outside the control of rural communities themselves. However, a range of other factors within the control of the school and community have also been found to influence the effectiveness of VET programs in rural communities. These factors include commitment and attitude towards school VET programs and the attendant issues of leadership, as well as factors relating to the availability and quality of the VET course provided. These two groups of influencing factors are relevant for all school VET courses, whether offered in rural or urban areas; however, the following discussion will focus specifically on research which highlights the impact of these factors in rural schools.

Commitment to and involvement in the school VET program

In order to maximise the outcomes of school VET programs in rural schools, there need to be high levels of commitment from students, schools and communities. In the first instance, research indicates that school VET courses offered need to be relevant to students' needs, and that students must participate in programs for the 'right' reasons. For example, Fullarton (1999) found that rural students (from communities of 1000 or less) tended to more actively seek school VET courses that provided work placements because they were less likely to continue with tertiary education than regional or metropolitan students. On the other hand, a study of school VET programs in three small rural Tasmanian communities (Kilpatrick, Bell & Kilpatrick 2001) found that students who only enrolled in order to be eligible for Youth Allowance were most likely to drop out.

Aside from individual commitment to school VET programs, effective programs need high levels of institutional (school) and community commitment, and the ability and desire to work together in the form of partnerships (Country Education Project Inc. and Youth Research Centre 2001; Kilpatrick et al. 2002). As Kilpatrick et al. noted, this commitment is reflected in a number of ways, including through the provision of adequate time, resources and support to develop and maintain the program. Most importantly, it is reflected in the way in which leadership of the program is shared, in order to build community commitment to, and ownership of, the program. This theme of inclusive or enabling leadership is also highlighted in recent research into effective leadership in the broader VET context (Falk & Smith in press).

Interestingly, Smith (1996) reported that employer commitment to school VET programs appeared to be linked to both community size and community economic circumstances. For example, in a small rural community of 6000 people, with high unemployment, she found greater employer commitment to the program than in more prosperous and larger rural communities and urban centres. However, it must be noted that Smith's findings only related to one small rural town in New South Wales. There appears to be little other research on the effects of rural community size and economic circumstances on either the outcomes or effectiveness of school VET programs, and there would appear to be an urgent need for national research into these issues.

Research such as Smith (1996) indicates that small rural communities may be well placed to maximise the outcomes of school VET programs because of a key attribute—their strong local networks. In support of this claim, findings from a national study by Fullarton (1999) indicated that participation in vocational work placement programs is higher in rural areas (population of 1000 or less) than in regional or metropolitan areas, a fact most likely attributable to 'the strength of personal contacts and knowledge' (Country Education Project Inc. and Youth Research Centre 2001, p.6).

Availability, nature and quality of school VET programs

Much has been written about the negative aspects of access to educational programs in rural areas—this issue was one focus of the recent Human Rights and Equal Opportunity Commission *National Inquiry into Rural and Remote Education* (HREOC 2000). It is beyond the scope of this review to cover the topic in any depth. However, issues of access and equity, resourcing, and the need for more staff professional development, are all factors which have been found to influence the effectiveness of school VET programs in rural areas (see, for example, Country Education Project Inc. and Youth Research Centre 2001; Kilpatrick et al. 2002). Additional issues that may detract from the effectiveness of school VET programs in rural schools include insufficient availability of suitable work placements, internal school organisational and travel issues, and difficulties faced by staff in keeping abreast of changes in the VET system (Country Education Project Inc. and Youth Research Centre 2001).

Despite these obvious limitations, research suggests that school VET programs may be particularly beneficial for rural students, and that rural schools may be well placed to deliver programs that maximise outcomes. The introduction of part-time school-based new apprenticeships has been found to be particularly beneficial in rural areas (Frost 2000; Country Education Project Inc. and Youth Research Centre 2001). Their value lies in their flexibility, in that they are organised individually rather than on a class or group basis. Smith and Green (2001) echo these findings, by citing flexibility and customisation to individual students' requirements as the hallmarks of effective work placements (vocational and other).

Most available research on the quality of school VET tends to focus on the quality of the work placement component, although some, such as the Gordon Institute of TAFE (2000b), focus on the quality of the TAFE component of the school VET course. Focussing specifically on work placements in rural communities, Smith (1996) reported that the quality was enhanced in smaller rural towns because of a range of factors, including greater acceptance of the school VET program by the community in general; greater employer satisfaction with their work placement students;

increased likelihood of employers participating on an ongoing basis in school VET programs; greater variation in the learning opportunities offered to students in small, mixed businesses; and higher levels of student satisfaction in terms of feeling confident and comfortable in their work placement. However, Smith (1996) cautioned that these findings needed to be balanced against some of the less positive aspects of work placements in small rural communities. For example, learning in the customer relations area is limited because work placement students know all the customers, and there is a perception that employers in small rural communities are more likely to be 'soft' on local work placement students and make allowances for them, whereas employers in larger regional or metropolitan locations are less likely to do this.

Conclusion

It seems reasonable to assume that the outcomes of much of the school VET research reviewed in this chapter relate to both urban and rural communities, at least to some extent. However, because only a small amount of research specifically compares urban and rural school VET programs, it is difficult to assess the extent to which rural outcomes compare with, or differ from, urban outcomes. There appears to be similarity regarding the link between participation in a school VET program and later employment outcomes. However, there is a suggestion that school VET programs may also address specifically rural issues, such as youth retention in rural communities, and this has implications in terms of rural community development. At the same time, the community capacity building role of school VET programs that has been researched mainly in relation to rural communities at this stage, may well have application to urban communities as well. There are indications, therefore, that further research into the similarities and differences in outcomes of participation in school VET programs for rural and urban students is warranted.

Methodology

Introduction

The project methodology uses case sampling to collect data relating to the experience and outcomes of school VET programs for rural students, and the potential impact of such programs on rural communities. Each case is a cluster of rural schools. The research design combines a survey that collects current and retrospective factual and attitudinal data from students, with document analysis of school documents relating to the school VET programs. This chapter describes the case or site selection, the survey instrument design, administration and survey participants, response rate and data analysis. It concludes by noting the limitations of the study.

Site selection

As this study has a national focus, state/territory education departments and/or boards of secondary studies (or equivalent bodies) in each state/territory, as well as Catholic and independent school organisations, were contacted and requested to provide a listing of all schools that offered school VET programs in 1998, together with enrolment numbers if possible. From these lists, urban schools, as well as regional and larger rural schools (located in communities with populations over 10 000) were deleted, and master listings of all rural/regional schools in each state/territory that offered school VET programs in 1998 were drawn up.

Sites excluded from the study

Because of budget constraints it was decided to target only small rural schools (located in communities with populations of 10 000 or less) with their correspondingly smaller student cohorts. On advice from the project Reference Group, it was decided not to include remote Aboriginal community schools in the sample. Reasons for this included very small numbers of VET students in these schools in 1998, difficulties of contacting students in remote locations, particularly within the time constraints imposed by this study, and low literacy levels which would most likely preclude participation by young people from these communities because the survey instrument was a written questionnaire. Although young people may have been able to complete the survey with assistance, because of budget constraints, we were unable to provide remuneration to cover such assistance. In short, research into Indigenous school VET is a discrete sub-set of research into school VET in general, and its particular issues and concerns are unable to be addressed in this pilot study, which uses as its survey instrument a written questionnaire.

The Australian Capital Territory was not included in the study because of its small number of rural schools. In addition, after discussion with the Reference Group, and with the support of the National Centre for Vocational Education Research (NCVER), it was decided not to include the Northern Territory in the sample. The reasons for this were the small number of Northern Territory schools offering VET in 1998, the inability of some potential school sites to provide the information required regarding the 1998 student cohort, and the fact that a number of the schools were remote Aboriginal schools which had already been excluded from the survey for the reasons outlined above. Although several schools in Darwin were willing to participate, this site did not meet the population criterion.

Selection criteria for school clusters

It was decided to select one school cluster from each state to participate in the study, rather than a number of schools from different regions within each state, as had been originally intended.[2] A profile of each cluster is provided in table 9 at the end of the Methodology. The decision to survey by school cluster was made for several reasons, including the small sample size in some small rural schools and the need for the study to include a selection of these small schools, as well as time and budgetary constraints. By selecting sites on a cluster basis, school clusters rather than individual schools are used as the unit of analysis, thus yielding information on the regional impact of school VET programs. It also ensures a larger sample for analysis. To facilitate administration and data collection, all school clusters finally selected were funded by ECEF.

To ensure that clusters selected would represent diversity in terms of the level of regional economic growth, final selection was informed by the Monash Multi-Regional-Green model of economic development (Adams, Horridge & Parmenter 2000, Fig.2, p.25). This model divided Australia (excluding the Northern Territory and Australian Capital Territory) into 56 regions, which largely approximated Australian Bureau of Statistics Statistical Divisions, and then ranked these regions by average economic growth for the period 1996–97 to 2007–08.

From the Adams, Horridge and Parmenter (2000) model, it could be seen that Queensland and Western Australia had the greatest number of regions with high average growth; New South Wales and Victoria the greatest number of medium average growth regions, and Tasmania and South Australia the greatest number of low average growth regions. Final selection of sites from each state largely reflected this pattern, although advice received from the Education Department of Western Australia required us to select a site in that state which is a medium average growth region. To compensate, a Victorian site with medium high average growth was chosen. Table 1 lists the Statistical Division in which each state cluster is located, together with average regional growth.

Table 1: Average regional growth of study site statistical divisions

Location of site by state and statistical division	Average regional growth level in statistical division
Queensland (Wide Bay-Burnett)	High
Victoria (Barwon)	Medium High
Western Australia (Wheat Belt)	Medium
New South Wales (2 clusters: Northern and South Eastern)	Medium
South Australia (South East)	Medium Low
Tasmania (Mersey Lyell)	Low

Final selection of school clusters was informed by the project Reference Group, and was subject to the willingness and ability of VET cluster coordinators, school principals and other school staff to assist the researchers in distributing the survey instrument. Clusters were selected to represent diversity in terms of average regional economic growth and in terms of the stated purpose(s) of their school VET programs. From information given by schools, responses were sorted into three purposes or aims for school VET courses: as *pathways to local employment*, as providers of *general workplace skills and knowledge* and as an *alternative to the mainstream curriculum*. These were not mutually exclusive (see table 2) with the Queensland and Victorian clusters providing both *general work skills* and an *alternative to the mainstream curriculum* and the Tasmanian cluster providing *general work skills* and *a pathway to local employment*. A comparison of clusters by average regional economic growth and purpose(s) of the school VET program is provided in the following table.

[2] In New South Wales, two smaller clusters, rather than one larger cluster, were selected. Although they are in different regions of the State, they are similar in terms of their medium level of regional economic growth, and in the main purpose of their school VET program. For this reason, data from the two clusters are aggregated for reporting purposes. Profiles of the two clusters are provided in the study site profiles in table 9 at the end of this chapter.

Table 2: Comparison of economic status of clusters with purposes of school VET programs

School cluster and economic status		**Purpose of school VET program**		
State cluster and statistical division	Average regional growth in statistical division	General work skills	Local employment	Curriculum alternative
Queensland (Wide Bay-Burnett)	High			
Victoria (Barwon)	Medium High			
Western Australia (Wheat Belt)	Medium			
New South Wales (two clusters: Northern/South Eastern)	Medium			
South Australia (South East)	Medium Low			
Tasmania (Mersey Lyell)	Low			

It is interesting to note that *pathway to local employment* was the purpose of clusters in the lower regional growth areas of Tasmania, South Australia and Western Australia where *alternative to mainstream curriculum* was the purpose of those in the higher growth areas of Queensland and Victoria.

School clusters selected typically contained between three and six small schools, and often one or more schools from a larger regional centre. For the purposes of this study, schools from the larger regional centres (population greater than 10 000) were excluded from the study, with the exception of Tasmania. This is because in Tasmania, Year 11 and 12 students traditionally attend one of the state's senior secondary colleges, which are located in the four main population centres. The number of students remaining in rural high schools to complete senior secondary studies is small. For this reason, a larger rural community (population 19 134) with a senior secondary college was included in the Tasmanian cluster.

It should be noted that not all rural schools from the selected clusters agreed to participate, and that several withdrew at short notice towards the end of the 2001 school year, leaving insufficient time to find replacements. This explains the small number of schools in some clusters. However, discussions with ECEF confirmed that the participating schools were considered to be representative of their cluster, in terms of the profile of VET students, and the nature and extent of VET courses offered.

School representation

Across the clusters, a total of 20 schools participated in the survey, comprising:

- two dedicated senior secondary colleges (Years 11 and 12 only)
- 15 high or senior high schools (Years 7–12 or 8–12, depending on the state[3])
- 2 area (central) schools, which typically cater for students from early childhood through to Year 12, depending on the state[4])
- one Catholic secondary school.

It is recognised that this does not reflect the actual proportion of ECEF-funded government, Catholic and independent schools offering school VET programs in rural areas in 1998. However,

[3] In Tasmania high schools typically cater for Years 7–10, but in rural areas make some provision for senior students (Years 11 and 12), although this provision varies from school to school.
[4] In Tasmania, the situation is similar for area schools as for rural high schools, as described in the above footnote.

the late withdrawal of two school clusters resulted in the selection of replacement clusters based solely on their availability at very short notice at the end of the 2001 school year, rather than on the mix of government, private and Catholic schools within each cluster. This under-representation of Catholic and independent schools needs to be borne in mind when interpreting the findings.

Survey instrument

The survey instrument was a written questionnaire. A draft questionnaire was designed, comprising a series of tick box, short answer and Likert-scale questions, and a section at the end for additional comments. A copy of the questionnaire is provided in appendix D.

The initial draft of the questionnaire was informed by the literature, and by reference to questionnaires designed for other destination surveys relating to school VET programs, including the ECEF national destination survey (ECEF 2002). Questions were grouped into four sections: Part A (general information about respondents); Part B (details of respondents' secondary school/college studies); Part C (questions about respondents' post-school study, employment and voluntary activities); and Part D (questions about school VET study). No additional documentation about student achievement at school was sought, so it was necessary to include a question in Part A to establish students' level of school achievement, and extent of engagement in school. Question 7 included a number of proxies for school achievement and engagement, such as whether students felt their senior school experience was 'just filling in time', whether it was 'useful to me personally', useful to post-school study or employment, and overall, whether they enjoyed school or not.

The draft questionnaire was reviewed by members of the project Reference Group and was trialled with a small number of young people who had been studying either Year 11 or Year 12 in 1998. A number of amendments were subsequently made, in order to reduce repetition and simplify instructions, to gain more specific details about the nature and status of post-school employment patterns, and to clearly define for respondents what constituted a school VET course in 1998.

Participant selection and participation

The study targeted young people from selected small rural communities who were in Year 11, 12 or 13 in 1998. Although a key aim was to survey those young people who had undertaken school VET courses, it was considered important to survey both VET and non-VET students from the relevant cohorts, in order to assess whether the post-school outcomes of the two groups differed. In addition, the researchers were interested in students who had participated in, but had not necessarily completed, a school VET course, given that other studies (see, for example, Smith 1996) had shown that there was a tendency for VET students in rural communities to leave school before completing Year 12, to take up employment as a result of their school VET study. The selection of participants was therefore a two-stage process:

1 All VET former students from the target group from each school were selected to participate. VET students were defined as those who were enrolled in a school VET course at the beginning of the 1998 school year.[5]

2 Each school then selected a random sample of non-VET former students from the target group, using an appropriate selection strategy (for example, selecting every third student from a

[5] In Tasmania, the total Year 11/12 VET student cohort for 1998 from the large rural centre could not be surveyed because of budgetary constraints. Therefore, a random sample of approximately equal numbers of VET and non-VET students was selected for inclusion in the study.

database of all available student names). Schools were requested to select approximately the same number of non-VET students as VET students.[6]

It is recognised that this sampling procedure is not a true reflection of the proportion of VET and non-VET students in most schools. For example, most of the schools in this study reported that approximately one-quarter to one-third of their senior students had undertaken school VET courses in 1998. However, as the key focus of this study is on the outcomes of school VET programs for rural students, it was deemed necessary to ensure strong representation of VET students; hence, approximately similar numbers of VET and non-VET students were targeted.

VET cluster coordinators and, in some cases, individual schools, conducted data collection on behalf of the University of Tasmania. A notable feature of having the schools assist with data collection was that VET coordinators and other staff in a number of the smaller schools went to great lengths to locate former students and to encourage them to respond to the questionnaire. Multiple copies of the questionnaires and information sheets, and reply paid envelopes, were forwarded to each coordinator/school. A letter on school letterhead endorsing the study and encouraging former students to participate was included in each package before mailout by the school. Copies of the questionnaire are provided in appendix D and the information sheet and a draft of the principal's letter in appendix E. Respondents were also asked to indicate whether they were prepared to participate in a subsequent follow-up study, should one be undertaken.

Strategies to increase the questionnaire response rate

It is recognised that written surveys tend to have a lower response rate than other methods of data collection, such as interviews (Burns 1997). To address this problem, the researchers incorporated into the research design a number of strategies to increase the questionnaire response rate. These strategies included careful design, review and trialling of the questionnaire, to ensure both content and layout were user-friendly and age appropriate. Other strategies included a media release outlining the aims and importance of the study, and encouraging young people to complete and return questionnaires. This release was forwarded to rural newspapers in all participating communities to coincide with the mailout of questionnaires. A key strategy was the assistance provided by staff in a number of the smaller schools in ensuring questionnaires reached former students. This included using a variety of community networks to locate former students, as well as hand delivering questionnaires to former students or their families. This is a similar strategy to that used by Searston (1996).

Originally the researchers had also proposed to follow up non-respondents by phone, in order to increase the response rate. However, with schools electing to mailout questionnaires themselves for reasons of confidentiality, the researchers did not have access to contact details of former students, and were unable to utilise this strategy.

Data collected

Questionnaire response rate

From a mailout of 1434 questionnaires, 95 were returned unclaimed. Of the 276 completed questionnaires received, 6 were unusable because respondents were not in Year 11, 12 or 13 in 1998. This left a total of 270 usable responses, giving an average response rate of just over 20%. Table 3 gives a breakdown of the response rate by state cluster.

[6] There were several variations to the selection process described above. Three schools elected to distribute questionnaires to a greater proportion of non-VET students than VET students, and in one Western Australian school there were no non-VET students because it was a dedicated VET senior secondary college.

Table 3: Response rate by cluster

State cluster	Qu'aires distributed	Qu'aires completed	Qu'aires unclaimed	Usable responses	Response rate (%)
New South Wales	208	34	8	34	17.00
Queensland	163	35	9	35	22.72
South Australia	110	26	4	25	23.58
Tasmania	349	63	30	63	19.74
Victoria	190	37	5	35	18.42
Western Australia	414	81	39	78	20.80

Table 4 gives a breakdown of usable responses for both VET and non-VET students by state cluster and gender. Consistent with the sampling procedure already described, the number of responses from VET students is comparatively high when compared with the non-VET responses.

Table 4: Breakdown of responses from VET and non-VET students by cluster

State clusters	Numbers of respondents				
	VET male	Non-VET male	VET female	Non-VET female	Total numbers
New South Wales	5	10	8	11	**34**
Queensland	6	10	4	15	**35**
South Australia	7	6	6	6	**25**
Tasmania	12	12	21	18	**63**
Victoria	10	10	4	11	**35**
Western Australia	33	4	16	25	**78**
Total	**73**	**52**	**59**	**86**	**270**

As the key focus of this study is on school VET students, table 5 provides detail by state cluster regarding the percentage of school VET respondents who participated in the survey.

Table 5: Percentage of participating school VET students by cluster

State cluster	Estimated* total VET enrolments for 1998	Number of school VET respondents	Est. % of school VET students responding
New South Wales	108	13	12.0
Queensland	88	10	11.4
South Australia	55	13	23.6
Tasmania	174	33	19.0
Victoria	79	14	17.7
Western Australia	258	49	19.0
Total	**762**	**132**	**17.3**

Note: Estimates only were available for all clusters except Victoria and Tasmania.

Other data collected

Information on the nature, purpose and reported outcomes of their school VET programs in 1998 was collected from each school cluster coordinator in the first instance, or from individual schools in the cluster where cluster information was not available. This publicly available information was collected from several sources, including by telephone from VET cluster coordinators and/or school principals, by way of written documentation provided by VET cluster coordinators and/or school principals, and from other sources, including Web site entries and reports produced by other groups or organisations in the region.

As all clusters selected were funded by the ECEF (known as the Australian Student Traineeship Foundation in 1998), student destination data for each cluster, collected as part of an ECEF annual national survey, were requested for the three years that the national survey has been conducted (1999, 2000 and 2001). Only 2000 cluster destination survey data from ECEF were available at the time of writing this report. In addition, destination data for the 1998 cohort were requested from each of the participating schools. As few of the schools had undertaken destination surveys at that time, this information was unable to be used as an additional source of data.

Data analysis

Coding data

Pre-coded questions

The questionnaire (see appendix D) was designed in such a way that most of the answers were pre-coded, using a numerical coding system (for example, 1=male; 2=female), to facilitate data entry to the SPSS quantitative analysis computer program. Returned questionnaires were first checked to ensure that responses to pre-coded questions were clearly marked, to facilitate data entry.

For question 15 which asked respondents to advise whether they had undertaken school VET study, it was known that former students from one particular school in Western Australia had all undertaken school VET courses, many of which were embedded in their curriculum. However, returned questionnaires from this school indicated that 18 of the respondents had not been aware they had undertaken VET study, because they ticked the No box. In order to ensure the statistics for that school, and for the project as a whole, were not misrepresented, it was decided to create a new category, Unaware/unsure of VET participation, into which all respondents from this school who had ticked No were placed. For purposes of subsequent data analysis, however, this group was included in the category of VET-in-school participants.

Questions 5, 11 (a), 18, and 24 (h) were all pre-coded, with the option labelled Other (see table 6). Where the Other option was selected, respondents were asked to give further details. Responses to these questions are provided below. There were no Other responses to question 5.

Table 6: Summary of other responses

Question number	No. of other responses	Summary of other responses
11 (a)	2	✧ Short-term courses (2 responses)
18	8	✧ VET subjects compulsory (3 responses)
		✧ Thought VET would let me sample different jobs (2 responses)
		✧ Wanted to gain knowledge of industry area (2 responses)
		✧ Thought VET would be useful in desired occupation (1 response)
24 (h)	4	✧ Responsible Service of Alcohol (1 response)
		✧ Certificate of Excellence in WA (1 response)
		✧ Certificate in Chemical Handling (1 response)
		✧ Other category ticked but no further details provided (1 response)

Questions not pre-coded

For some questions it was necessary for the researchers to make decisions about the way in which these would be coded. For question 3, which asked respondents to list the postcode of their normal place of residence, and question 13 which asked respondents to list postcodes of all the places they had worked in, postcodes were categorised into one of three groupings—metropolitan, rural, or remote—and new variables created. This classification utilised a framework developed by NCVER based on distance and population density characteristics (NCVER 1999).

A variable was created for 'low valuers' from pre-coded variables relating to question 7 about how respondents felt about their senior school experience. Respondents indicating agreement that school was just filling in time, or disagreement that school was useful personally, to later study, or a job, or was enjoyable were considered to be low valuers. A weighting was applied according to the strength of agreement/ disagreement (e.g. strongly agree or agree) such that each respondent achieved a 'value score' with the bottom 16% being accorded 'low valuer' status.

For question 9 (b), which asked respondents who had had a job while still at school to state how many hours per week they had worked, a number of respondents recorded their answer in terms of a scale (e.g. 5–7 hours). In these cases, an average of the two figures was calculated and entered. Some noted that they only worked during school holidays, so the number of hours was averaged over the whole year, to determine an average weekly rate. Where respondents recorded their answers in fractions (e.g. 7.5 hours) the next whole number was entered (i.e. 7.5 hours was converted to 8 hours). Three new variables were then created, using the categories 0–5 hours, 6–10 hours, and more then 10 hours per week.

Questions 11(b), 12(b), 13, 17, 23(l), relating to school VET, post-school study and employment classifications, were not pre-coded, as it was unclear exactly what responses would be received. After reviewing the range of answers provided for these questions, the researchers devised 23 codes, to represent both study area and industry of employment. They were derived in part from Australian Standard Classification of Occupations (ASCO), with additional classifications added to reflect the nature of school VET courses operating in rural areas in 1998. Questions were then manually coded against this framework. Owing to small numbers in many categories, the 23 variables were subsequently collapsed into six broad categories for analysis of school VET, post-school study and employment patterns (see table 7 which follows).

For question 26, which asked respondents to comment on the most useful aspects of their school VET course, the researchers devised a five-category framework to record responses: course characteristics, skills gained, educational outcomes (including credit/advanced standing), employment outcomes, and other outcomes (e.g. personal development/links with community).

Computer-aided analysis

Using the SPSS statistical analysis computer program, a coding framework was prepared, comprising a set of variables to represent the coded answers to the 26 questionnaire items. Data from each questionnaire were then entered into the program. Once these data were input, a number of additional variables were created from the original variables and from additional data sources, to aid data analysis.

New variables were created in the following key areas:

- ✧ Variables relating to respondents (current job status, move from school locality, level of school achievement, perceived value of senior school experience, participation in school VET work placement)
- ✧ Variables relating to school VET programs (purpose of the school VET program, i.e. industry-related, general focus, alternative program, in accordance with Misko 2001)
- ✧ Other variables formed by combining several questions or parts of questions into broader categories (post-school study; post-school VET study; no post-school study or apprenticeship; and a variable representing all respondents who had some experience of an apprenticeship/traineeship, including those who started but subsequently failed to complete the training)

Data were then analysed, first with reference to key findings and issues that emerged from the literature review. Subsequent analysis was guided by preliminary findings from phase one, and by input from the project Reference Group. Findings were cross-checked against existing destination data from participating schools and clusters, including the ECEF 2000 national survey data.

Table 7: Classification of post-school study and employment areas

Broad category areas	Original category areas
1 Technology and trades	2 Automotive
	3 Building and construction
	5 Communications
	7 Engineering and mining
	10 Information technology
	14 Science, technical and other
	23 Multi-trade
2 Business and clerical	4 Business and clerical
	8 Finance, banking and insurance
3 Human services	1 Arts, entertainment, sport, recreation
	6 Community services, health and education
	13 Sales and personal services
	17 Tourism and hospitality[7]
	20 Public safety
	22 Justice
4 Primary industry	9 Food processing
	11 Primary industries
	21 Environment
5 Work skills	18 Work skills[8]
6 Other	12 Process manufacturing
	15 Textiles, clothing, footwear, furnishings
	16 Transport and storage
	19 Other (e.g. cleaner, refuse disposal officer)

Limitations of the study

This is a relatively small scale pilot study whose findings cannot necessarily be generalised to all rural schools and communities. The participants in this study may not be fully representative of their 1998 cohort. The sample is self-selecting; therefore responses received were from former students who had a particular reason for wanting to participate in the study (for example, students who had done well after leaving school and students who had particular grievances about senior schooling). In addition, the survey instrument may have discouraged participation by those with lower literacy levels. It is recognised that responses are therefore weighted towards more 'successful' and literate students, and this needs to be borne in mind when interpreting statistics such as the rate of post-school education and training. However, it should be noted that a number of other studies into school VET outcomes (e.g. Misko 2001; ECEF 2002) are also based on self-selecting sample.

Because the survey relates to a course of study undertaken three years ago, it is likely that respondents' recall of certain information relating to the type of VET course undertaken and accreditation received may not be as clear as it would have been if the survey had been conducted in the year after they completed school. This may have influenced some of the responses, and may have contributed to the lack of detail provided by some respondents. Also related to the time factor is the problem of locating former students some three years out of school. The response rate

[7] Includes those employed in the fast food industry.
[8] This includes accredited generic work skills and work education courses, as opposed to industry-specific courses. Known by different names, depending on the state (e.g. Work Studies in NSW; Work Education in Tasmania).

suggests that a number of young people were no longer at their 1998 address and did not receive the survey. While every effort was made to contact former students given the time and budgetary constraints on this project, it is recognised that the sample of respondents is weighted towards those who had remained in the same location, or whose families were still in the same location. This needs to be taken into account when interpreting statistics regarding youth retention in rural areas.

Another limitation of this study arises from asking respondents to self report their participation in school VET study, by answering either Yes or No to the question ‘Did you participate in any VET-in-schools courses in Year 11/12/13? Despite a definition of VET-in-schools being provided in the questionnaire, there is evidence to suggest that participation was under-reported, although it is unknown by how many. This means that the numbers of VET and non-VET students reported in this study may not be an accurate reflection of the situation in 1998.

Finally, the study does not provide chronological links between study, employment and locality of residence. It was not possible to analyse study outcomes in detail as no data were collected on when respondents commenced post-school studies and whether or not they completed the courses they had started after leaving school. It was difficult to analyse the permanency of current work, as the terms full-time, casual and self-employed are not mutually exclusive and hours currently worked were not collected. Nor were data collected on unemployment currently and over time. Tracking rurality of residence by postcodes is useful but of variable consistency for students who consider their parents’ residence as their home address, even while living elsewhere for study. To achieve a more detailed chronology of post-school outcomes, the questionnaire could have used a matrix format that covers activities over the years in question. A matrix such as that below (table 8) would help overcome these problems.

Table 8: Proposed matrix format to record post-school outcomes chronologically

YEAR	MONTHS	STUDY			WORK			LOCATION		
		COURSE	INSTITUTION	STATUS	JOB	STATUS	HOURS/ WEEK	POSTCODE		
								STUDY	WORK	LIVE
e.g. 1998	January/ June	Diploma of Accounting	TAFE	FT	Sales, clothes	Casual	15	7250	7310	7315
	July/ December	“	“	“	Sales, food	“	10	“	7250	7250
1999	January/ February	nil			Unemployed					

Such a questionnaire could be followed up with a qualitative study of a sample of these respondents using taped interviews to gain in-depth information on the factors influencing these lifestyle, employment and study decisions.

Table 9: Profile of study sites

State/statistical division	Type of schools in cluster	Communities served by cluster schools	Regional industry/ employment base	Nature of VET program
New South Wales (Northern)	Two state government high schools in cluster, but only one participated in the study.	One rural community with population of 9378. This is a key commercial centre for the district.	Primary industry: wheat, sheep, mixed farming. Major employers: retail chains, abattoir and rural manufacturing companies. Employment opportunities for youth limited. Medium average regional growth level in Statistical Division.	Program developed in the mid 1990s, with the purpose of developing general workplace skills and awareness amongst young people, and maximising their advantage post-school. Popularity of VET courses has increased in recent years, with up to 70% of senior school students now participating. In 1998 courses were available in office skills and hospitality/tourism.
(South Eastern)	Four state government schools (three high schools and one central school).	Four communities with populations of 5915, 2064, 1502 and 1069, respectively. The largest community is relatively prosperous; others are less diversified.	Industries in the largest community include retail, service, and tourism. In the three smaller communities industries are a hardwood mill; apples and stone fruit, and vegetable growing and metal fabrication, respectively. Medium average regional growth in Statistical Division.	VET cluster developed in 1995, with the purpose of developing general workplace skills and awareness, and maximising post-school advantage. VET students undertake extensive work-based training (approx 5 weeks per course). Courses are offered in a variety of industry areas including automotive, office skills, electronics, forestry/primary industries, tourism and hospitality, and work studies. Offers school-based new apprenticeships.
Queensland (Wide Bay–Burnett)	Three state government high schools.	Three small communities, with populations of 1781, 1288 and 519 respectively.	Major industry is primary production: beef, pigs, milk, lucerne, grain and citrus, plus businesses servicing agricultural industry. There is also forestry, fishing, and a growing tourism industry. Growth employment areas include hospitality & tourism, and health & community services. Average regional growth level in Statistical Division rated as high.	Cluster established in 1997. One of the schools in not formally part of the cluster, but offers similar VET courses and was keen to participate in the survey. Relatively high uptake of school VET by students in this cluster. Purpose of VET programs is to give students general experience of workplace while still at school and to cater for needs of less academically inclined students. School-based new apprenticeships on the increase. In 1998 VET offerings within the cluster included hospitality, computer studies, primary industries, and business.
South Australia (South East)	Three state government schools (two high schools and one area school). The cluster includes additional schools from a larger regional centre that was excluded from the study because of size. In addition, another eligible state government school declined to participate.	Three communities, with populations of 4717, 1189 and approx. 200, respectively. Smallest community services wider farming community of 5000 people.	Main industries include agriculture (sheep, cattle, wheat, mixed farming), aquaculture, viticulture and forestry. Unemployment in general is comparable to national average, but restricted employment opportunities for youth. Average regional growth level in Statistical Division rated as medium-low.	This cluster established in 1997, with a focus on helping youth find local employment. The school in the largest of the three communities offers engineering as the main VET area, introduced to give students a pathway to jobs in the metals, engineering and associated industries in the region. Courses most likely to result in employment are building and construction, hair and beauty, automotive and engineering pathways. Other VET areas within the cluster include forestry, aquaculture, racing, business & clerical, community services & health, furnishing, hospitality, retail, tourism, and viticulture. The high school in the largest of the three communities shares a campus with TAFE, which facilitates joint delivery of programs.

State/statistical division	Type of schools in cluster	Communities served by cluster schools	Regional industry/ employment base	Nature of VET program
Tasmania (Mersey Lyell)	Two state government schools (one high school, and one senior secondary college servicing Year 11 and 12 students only). Two other schools in smaller communities belong to the cluster but did not participate in the study.	Two communities: large rural (pop. 19 134*) and small rural (pop. 3313). *Reasons for selection of a larger community are discussed earlier in this chapter.)	District supports primary industry (beef, dairy, crops). Large rural centre has pulp and paper manufacturing mill. High unemployment in district, particularly for youth, and high welfare dependence. Future employment likely in manufacturing related to primary industry, hospitality & tourism, business, and health & community services. Average regional growth level in Statistical Division rated as low.	Schools are from two separate but geographically close, and similar, clusters. Retention of students from Year 10 to Year 11 a key focus. Operating since the mid 1990s, VET programs are responsive to community needs, and aimed at giving students skills to access local employment. Programs also provide generic workplace skills and awareness, and appropriate post-school pathways, because of limited youth employment opportunities. In 1998, only work education offered in small rural community. Large community offered work education, automotive and foundation engineering. Other courses: business, hospitality, IT and retail.
Victoria (Barwon)	Two state government high schools and one Catholic college. Cluster includes additional schools that did not participate. Four eligible state government schools declined to participate. Other schools located in a nearby regional centre with a population greater than 10 000 were excluded.	Two communities with similar populations: 9793 and 9385, respectively.	Covers a vast area of southwest Victoria. Regional economy comprises primary industry and small business. High level of unemployment among young people. Local government and other groups are currently focussing on strategies to improve school-to-work transition and address regional skills shortages. Average regional growth level in Statistical Division rated as medium-high.	Cluster established in 1996, and provides an alternative to the mainstream curriculum; includes students with learning disabilities. The only VET course offered in 1998 in the Catholic college was hospitality. Government schools offered VET courses in electronics, engineering, automotive, hospitality, primary industries, information technology, and small business practice. Information technology as a VET subject was compulsory in some cluster schools in 1998. New apprenticeships also offered. In recent years, a number of employers have recruited apprentices through the school VET program.
Western Australia (Wheat Belt)	Four state government schools: three senior high schools and one senior secondary agricultural college.	Four communities of varying sizes: populations of 6300, 2911, 1664 and 715, respectively.	Large, sparsely populated area of Western Australia with strong focus on primary industry, particularly grain production. High proportion of owner-operated farm businesses. Limited work opportunities, and socio-economic disadvantage within the region. Relatively high youth unemployment; many young people leave to seek employment elsewhere. Number of students continuing with university is low. Average regional growth level in Statistical Division rated as medium.	Cluster established in 1997. Includes five schools, one of which is not represented in this survey. Focus of VET is on providing young people with skills to access competitive TAFE courses, and on helping them to gain local employment. Programs include structured workplace learning and off-the-job (school) learning. Courses offered in 1998 included business, tourism & hospitality, primary industries (agriculture, landcare), automotive, building & construction, and childcare. VET courses well supported by local businesses. The senior secondary agricultural college is a Registered Training Organisation.

Results and discussion

Introduction

This study differs from many other destination surveys, largely because of its medium-term focus. It is interested not just in current or point-in-time outcomes, but also in all the education, training, employment and community outcomes of school leavers in the two to three years since they left school. The researchers consider such a focus to be important in helping to build a more comprehensive picture of the post-school pathways of rural students, and in beginning to raise awareness of the medium to longer-term outcomes of participation in school VET programs for rural students.

However, care needs to be taken when comparing the results presented in this chapter with results from point-in-time destination studies, as the results are not directly comparable. For example, rates of participation in post-school education and training reported in this study are higher than the national average or than rates cited in some other research. This is because this study sought information on all post-school education and training commenced since leaving school some two to three years beforehand, rather than the participation rate at one point in time. It also reflects the fact that the current study includes apprenticeships and traineeships in the category of further education and training outcomes, whereas a number of other destination studies include apprenticeships and traineeships only as employment, and not also as further education and training.

The findings in this chapter also need to be interpreted in the light of the sample bias (for full details see the Methodology). The sample is self-selecting and is therefore biased towards 'successful' students. Sample bias was also influenced by the choice of a questionnaire as the survey instrument in that respondents choose to complete and return a written questionnaire. In addition, because questionnaires were mailed to the last-known address of students as per 1998 school records, there was also some bias towards those young people who had remained in the locality where they had attended school. This needs to be borne in mind when interpreting statistics such as the rate and outcomes of post-school education and training, and when comparing these statistics with Australian Bureau of Statistics random sample statistics.

This chapter comprises five sections: Profile of respondents and perceptions of senior school years; Overview of the responses of school VET students; Outcomes of participation in school VET programs: education and training; Outcomes of participation in school VET programs: employment; and Outcomes of school VET programs for rural communities. In the first section results for the total sample (comprising school non-VET and school VET students) are presented. The four subsequent sections focus on school VET outcomes, as well as highlighting key points of similarity and difference between school VET and school non-VET participant outcomes.

Profile of respondents and perceptions of senior school years

This section provides a general overview of the characteristics of all respondents and compares a range of basic outcomes for school VET and school non-VET participants. It provides basic data on responses to survey questions and thus generally follows the order of the questionnaire (see appendix D). For the purpose of clarification, where reference is made to 'all' students in this report it applies to both those school VET students and school non-VET students.

Comparison of characteristics of school VET and school non-VET students

Gender, state of origin and ethnicity

Of the 270 students from whom valid surveys were received, 125 (46.3%) were male and 145 (53.7%) were female. This is a slightly higher ratio of females to males than the figures recorded in the ABS survey *Transition from Education to Work 1998* (1998b) which gives approximately equal numbers of males (49.8%) and females (50.2%) over 15 years of age attending secondary school in May 1998.

The responses included only six (2.2%) Indigenous students, one (0.4%) whose first language is not English and fourteen (5.2%) students with parents for whom English is a second language. These numbers are too small to make any comments about the relationship between ethnicity and school VET participation.

The intention of the sampling method was to have approximately equal numbers of school VET and school non-VET students as respondents. While the totals for all states together achieved this, there was considerable variation within figures from individual states (see table 10).

Table 10: Respondents by state cluster and school VET participation

State cluster	School VET students		Non-school VET students		Total number	Total % of sample
	Number	% of cluster	Number	% of cluster	Number	%
New South Wales	13	38.2	21	61.8	34	**12.6**
Victoria	14	40.0	21	60.0	35	**13.0**
Queensland	10	28.6	25	71.4	35	**13.0**
South Australia	13	52.0	12	48.0	25	**9.2**
Western Australia	49	62.8	29	37.2	78	**28.9**
Tasmania	33	52.4	30	47.6	63	**23.3**
Total	**132**	**48.9**	**138**	**51.1**	**270**	**100.0**

Of the total number of respondents, 27% (n = 73) were males and 22% (n = 59) females who had taken part in a school VET program in Years 11/12/13, and 19% (n = 52) were males and 32% (n = 86) females who had not taken part in a school VET program in those years. Because previous research shows different outcomes for male and female students (Fullarton 2001), data is analysed by gender in the following discussion.

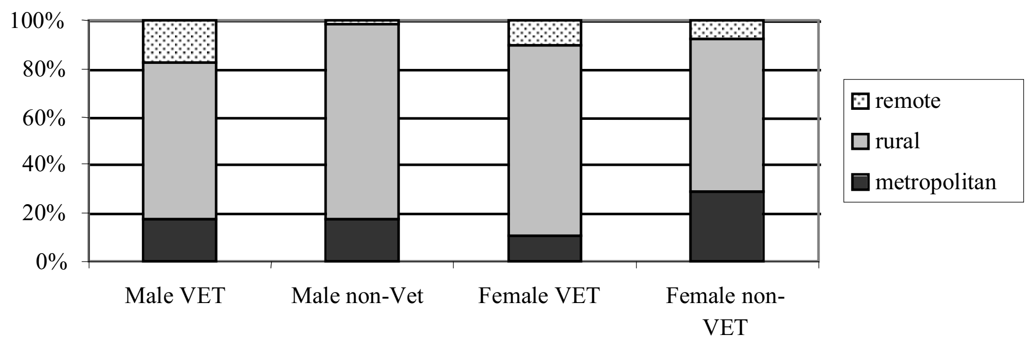
Where respondents lived at the time of the survey

All students surveyed had been studying in rural schools (i.e. in communities with populations of 10 000 or less; see Methodology) in 1998. At the time of the survey in December 2001, respondents were asked for the postcode of the town or locality where they normally lived, and these were sorted by locality as rural, remote or metropolitan.[9]

In considering these results it must be noted that the survey was forwarded to respondents at the end of the academic year when respondents who were metropolitan tertiary students would be more likely to give their parents' rural address as their current home address. As discussed in the methodology chapter, the sample is also likely to be biased toward those who have remained at or near the address where they lived while at school because mail may not have been forwarded from their school days address. It must also be noted that these years tend to be a very mobile time in the lives of school leavers.[10]

At the time of the survey, some two to three years after they had left secondary school, 70% of respondents normally resided in a rural area, 10% in a remote area, and 20% in a metropolitan area (see table A1 in appendix A). School VET students were less likely to be living in a metropolitan area (14%) than school non-VET students (25%), although this difference was entirely due to the difference between school VET and school non-VET females (see figure 1). Conversely, school VET students were more likely to be living in a remote area (14%) than school non-VET students (6%), although this difference was mainly due to the difference between school VET and school non-VET males. Consequently, school VET females were more likely than school non-VET females to live in a rural (or remote) area, whereas school VET males were no more likely to live in a rural area than school non-VET males.

Figure 1: Rurality of residence by school VET participation and gender



Note: χ^2 p=0.018* male school VET/ school non-VET; χ^2 p=0.024* female school VET/ school non-VET (* = statistically significant).

The majority of respondents from every state cluster were living in a rural area; however, significantly higher percentages of students in the Queensland, WA and SA clusters lived in a metropolitan area than those from the other clusters (see table A2 in appendix A). WA cluster respondents were the most likely to indicate they currently lived in a remote area, yet SA cluster

[9] Rural, remote and metropolitan categories were defined according to NCVER classifications based on distance and population density characteristics (NCVER 1999).

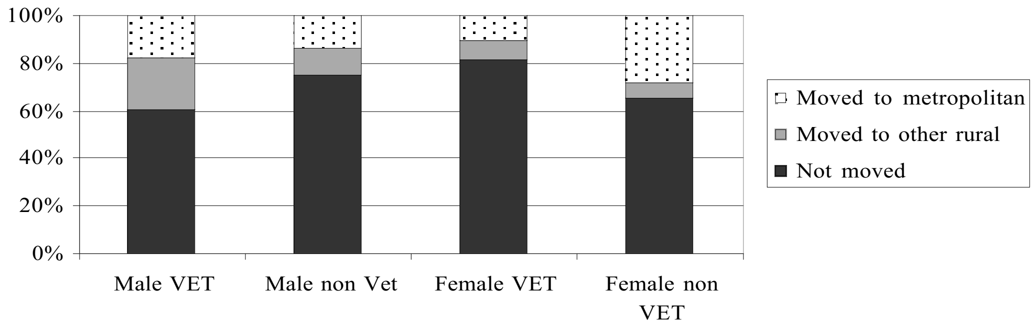
[10] ABS 1999 3237.2 *Population Mobility Victoria* and ABS 2000 3237.3 *Population Mobility Queensland* state 18–24-year-olds are second most mobile adult age group: 25–34-year-olds are most mobile.

respondents were the most likely to indicate they currently worked in a remote area (see table A3). No students from NSW or Victoria were living in remote areas.

The postcodes of the respondents' residential localities were also compared with those of the localities of their senior secondary schools to find whether and where the students had moved since 1998 (see table A5). The majority of students (70%) have not moved or, if they have moved, have since returned home. Of the remainder, 13% have moved to other rural areas and 18% have moved to metropolitan areas (see figure 2).

As suggested by the residential figures above, non-school VET females were more likely to move to metropolitan areas. The most mobile group overall was school VET males, with 22% moving to other rural areas (including remote areas) and 18% to metropolitan areas. Female school VET students were the group most likely to be residing in the locality where they attended school (81%) (see figure 2). Thirty-three per cent of females (school VET and school non-VET) studying full-time at university and 27% of males studying full-time at TAFE had moved to a metropolitan area (see figure A1).

Figure 2: Mobility of school VET and school non-VET students after leaving school



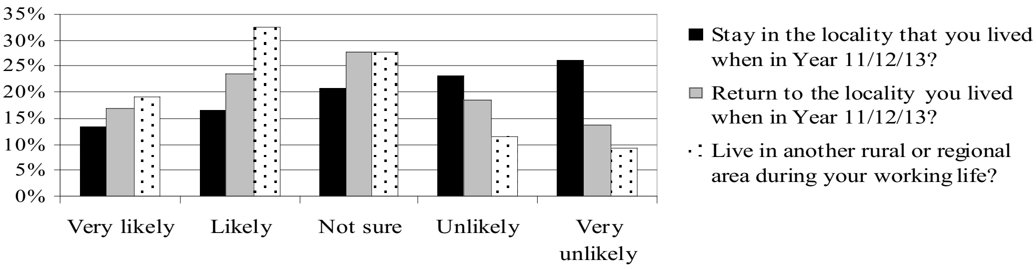
Note: χ^2 p value for males 0.207; for females 0.035* significant for movement of school VET versus school non-VET females.

NSW cluster respondents were the least mobile and WA cluster respondents the most mobile (see table A4). Tasmanian (94%) and Victorian (93%) cluster school VET students were most likely to be living in a rural area. No school non-VET students in the WA cluster have moved to another rural area, with 66% not moving and 34% moved to a city.

Where respondents intended to live in the future

Students were asked in the survey where they intended to live in the future (see figure 3). Overall, 76% of respondents intended to live in a rural or regional area during their working life (see table A6), and around half the respondents intended to stay in or return to the community where they went to school during their working life (see table A7).

Figure 3: Comparison of answers from all respondents about where they intend to live in the future.



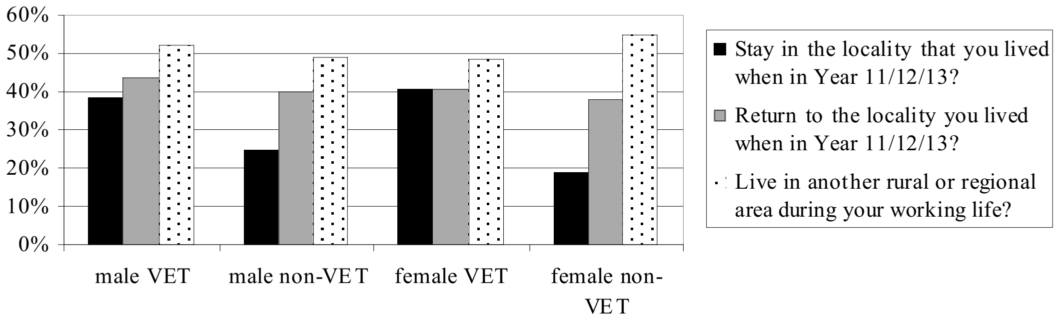
It appears that school VET students in general are more likely than school non-VET students to intend to live in a rural location (table 11). When those who have gone on to university study are removed from the sample, only 66% of school non-VET students intend to live in rural locations in the future, compared to 82% of school VET participants (see figure 4). Between 69% (SA) and 85% Tasmania and NSW) of school VET respondents from each cluster intend to live in a rural area during their working life.

Table 11: Intention to live in a rural community during working life by school VET participation

School VET participation	Intend to live rurally		Not intend to live rurally or uncertain		Total	
	No.	%	No.	%	No.	%
School VET	106	80.3	26	19.7	**132**	**100**
School non-VET	98	71.0	40	29.0	**138**	**100**
Total	**204**	**75.6**	**66**	**24.4**	**270**	**100**

Note: χ^2 p=0.076 school VET/school non-VET. With full-time university students removed χ^2 p=0.023* school VET/school non-VET.

Figure 4: Those likely to live in a rural area during their working life by school VET participation and gender



Note: χ^2 p=0.006* school VET/school non-VET staying in the locality where they lived in Years11/1/2/13, for females χ^2 p=0.022*. No other differences are significant.

There are indicators that school VET students are also more likely to intend to live in their home community (table 12). Between 39% (NSW) and 61% (Tasmania) of school VET respondents from each cluster intend to return to their home community. Male school VET students were more likely than other male students to intend to live in a rural community during their working life (63% compared to 38% of school non-VET students). There were no other differences in residential intentions according to gender.

Table 12: Intend to live in home community during working life by school VET participation

School VET participation	Live in home community		Not intend to return or uncertain		Total	
	No.	%	No.	%	No.	%
School VET	72	54.5	60	45.5	**132**	**100.0**
School non-VET	61	44.2	77	55.8	**138**	**100.0**
Total	**133**	**49.3**	**137**	**50.7**	**270**	**100.0**

Note: χ^2 p=0.089 school VET/school non-VET.

Victorian students, particularly males and school non-VET students, seem to have made a more definite break with their rural roots. A much higher percentage of Victorian males (53%) were very unlikely to return to their school locality compared with WA males where 46% said they were likely or very likely to return. More Victorian school non-VET students (65%) said they were unlikely to return to their school locality than school VET students, 46% of whom indicated they were likely to return.

Completion of Year 12

In 1998, 59% (159 students) of respondents were in Year 11, 40% (109 students) were in Year 12 and less than 1% (two students) were in Year 13.

The majority of students who answered the survey completed Year 12 (84% of males and 92% of females). No NSW and Queensland students left before Year 12. There were 31 respondents who left school before completing Year 12. They were more likely to be male and slightly more likely to have been school VET students.

A slightly lower percentage of school VET students of both genders completed Year 12, with 20 early leavers being school VET students and 11 school non-VET (see table A8). School VET males tended to leave school earlier, at the end of Year 11 or during Year 12, and school VET females were more likely to go on to Year 13 than others in their cohort; however, the small numbers in each category prevents generalisation.

Tasmanian cluster school VET students were least likely to complete Year 12. One-third of school VET students (11) failed to complete Year 12 compared with 4 of the 26 responding school non-VET students (13%). This is consistent with the low retention rate in northwest Tasmania (Kilpatrick, Abbott-Chapman and Baynes 2002).

Leaving school early did not necessarily handicap students in terms of post-school education or employment[11]. Early leavers were as likely to go onto post-school education and training as those who completed Year 12, and more likely to go on to post-school VET study, with 16 of the 20 male early leavers commencing an apprenticeship/traineeship, and of the four who did not, one commencing full-time TAFE and another part-time university.

All 31 of the early school leavers were employed at the time of the survey and early leavers were significantly more likely to have full-time work (71% vs 50%) than those who had completed Year 12 (see table A9).

Perceived value of senior school years

Respondents were asked to assess the value of their senior school experience in terms of relevance, usefulness, and enjoyment. These responses were analysed separately below. Low achieving students tend to place a low value on their school experience (Fullarton 2001). No indication of school grades was sought in this study, but in order to make some indirect comparisons with this literature, responses to these questions about senior school experience were also aggregated (into low, medium and high values) and used to identify the broad value placed by students on their senior school years (see Methodology section).

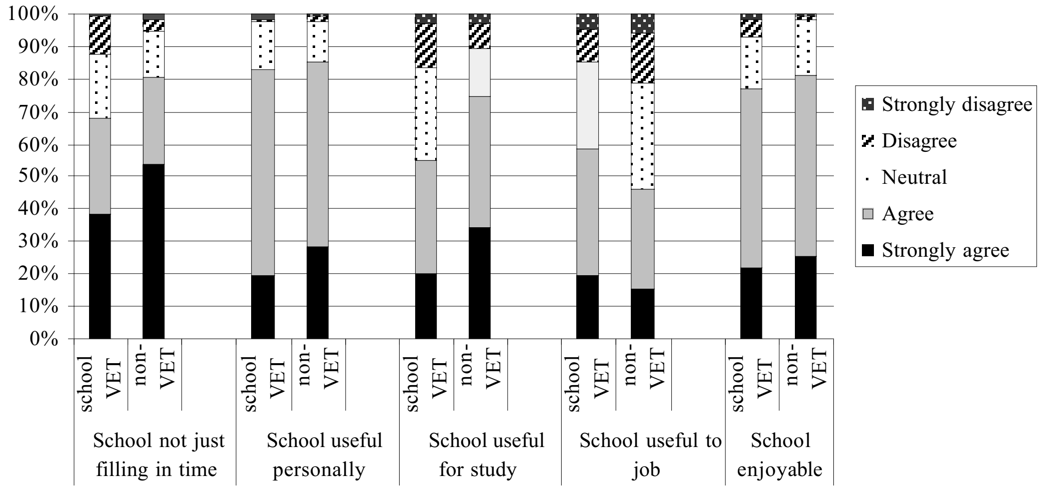
Most students surveyed were positive about the value of their senior school experience. While these responses may reflect the self-selection of respondents (i.e. the more enthusiastic students may be more likely to reply to the survey), it is worth noting none the less.

More males than females, and school VET than school non-VET students, said they were just filling in time at school (13% compared with 5% for both males vs females and school VET vs school non-VET) (see figure 5 and table A10). A large majority agreed or strongly agreed that their senior years were useful to them personally (83% school VET and 85% school non-VET), while more school non-VET than school VET students said school was useful to their post-school study (75% school non-VET compared with 55% school VET) and more males than females said school

[11] Sample biased toward achievers; unemployed less likely to reply

was useful to a current or previous job (60% males vs 46% females). A large majority agreed or strongly agreed that school was enjoyable (77% school VET and 81% school non-VET)

Figure 5: Reflections on senior school experience

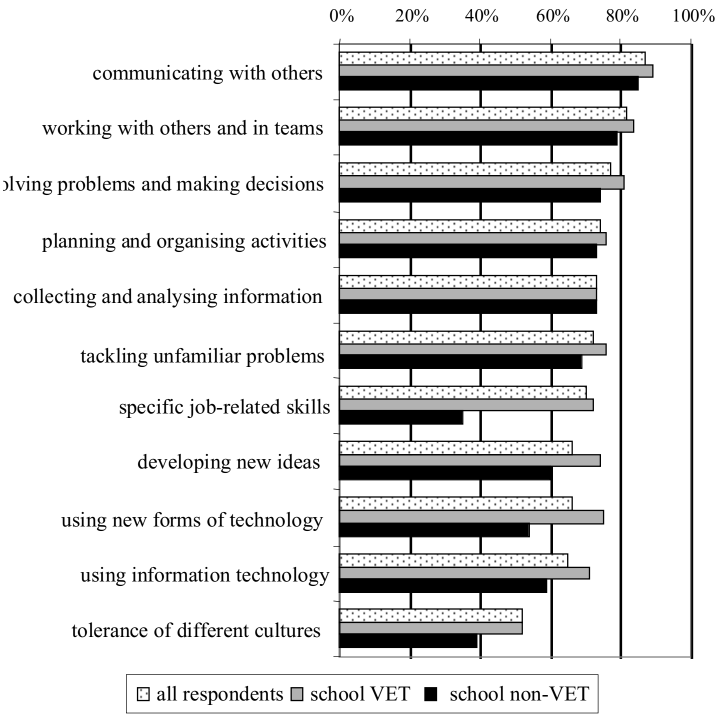


Note: values for the first category ('school just filling in time') were put in the negative to make comparative sense in the figure.

Value of school in developing general and specific job skills

Students were generally positive about the value of school in developing general and job-specific skills (see figure 6 and table A11). The only question where a minority agreed was re gaining skills and knowledge in understanding and tolerance of people from different cultures. Only 45% agreed with this statement, although a large group (34%) were neutral or uncertain and 21% disagreed (see table A11). This may reflect the predominantly mono-cultural composition of the rural study sites.

Figure 6: Percentage of respondents agreeing or strongly agreeing that their Year 11/12 school studies helped them gain general and specific job skills



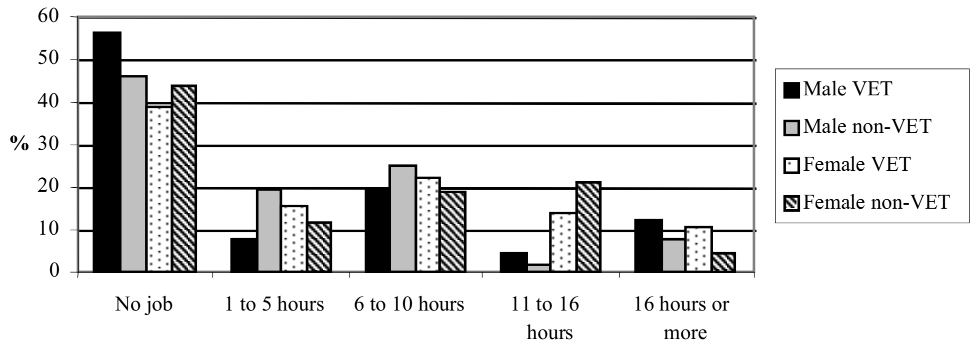
School VET and school non-VET participants gave similar responses to most of the questions about the value of senior school in helping them develop generic and job-specific skills. More school VET than school non-VET participants agreed or strongly agreed when asked whether school helped them in developing specific, job-related skills, and in using IT and new forms of technology. These outcomes are consistent with the practical emphasis of school VET courses. Female school VET students in particular reported benefits from learning to use IT and new forms of technology. School VET participants were also more positive about the influence of school in developing new ideas than school non-VET participants.

Part-time employment while at school

Over half the respondents (55%) had a part-time or casual job while at school. Female school VET students (63%) were most likely of all students to have had a casual job while at school, whereas male school VET students (45%) were least likely to have been employed (see figure 7 and table A12). The proportion of students working while at school compares with the findings in Smith and Green's (2001) study where 60% of students surveyed (50.1% if family business was excluded) had formal part-time work while at school. They found that more females than males and more rural than urban students were involved in work.

Of the students who had a casual job while at school, the majority (63%) worked up to 10 hours a week, with the average being 9.8 hours worked and only 13% working 5 hours or less (see figure 7 and table A13). The rural students surveyed in the current study generally worked longer hours than Smith and Green's (2001) mixed urban and rural cohort, with students in that study averaging 8.5 hours work per week with 42% working 5 hours or less. Significantly more female school non-VET students (46%) than male school non-VET students (18%) worked more than 10 hours per week. There was no significant difference in hours worked between male and female school VET students. Those Tasmanian and WA students who did have a job at school worked the longest hours.

Figure 7: Hours worked by students while at school



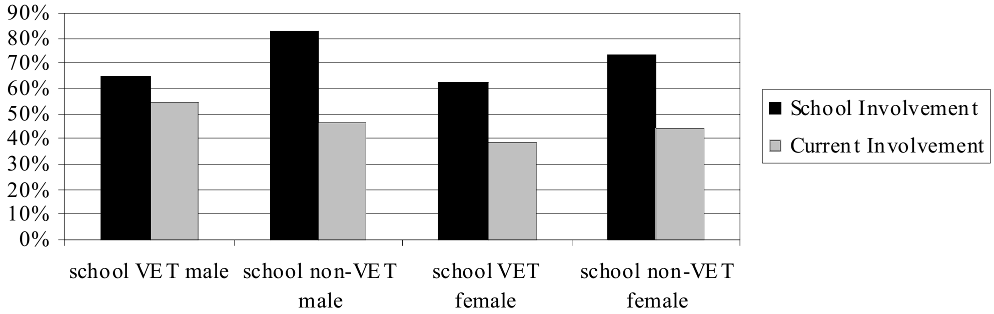
Note: χ^2 p=0.285 male school VET/school non-VET; χ^2 p=0.495 female school VET/school non-VET.

Community involvement during and after leaving school

High percentages of students (72% of males and 69% of females) were involved in community groups while at school (for example sporting, emergency services or drama groups) (see table A14).

A greater proportion of school non-VET students, particularly male school non-VET (83%), took part in community activities while at school than school VET students, particularly females (only 63%) (see figure 8). However, male school VET students (54%) were more likely to be *currently* involved in community activities than all other students, despite being the most mobile group as described earlier, and female school VET students (39%) again were the least involved post-school, despite being the group most likely to stay in their community.

Figure 8: Comparison of community involvement of respondents during and after leaving school



Note: χ^2 p values: males at school 0.025* (significantly more school non-VET than school VET males took part in community activities while at school); females at school 0.178; males currently 0.374; females currently 0.481.

Participation in community activities dropped considerably after leaving school for both males (down 21%) and females (down 27%). The drop in participation for school VET males (down 10%) is considerably less than that for school non-VET males (down 36%), although fewer of this group were participating at school.

There was a significant difference between clusters in community involvement at school with the Victorian cluster having a high 89% involved and the Tasmanian cluster a low 54%. The significance of this difference disappears when clusters are compared by post-school (current) community involvement, as Victoria experiences the greatest drop (45%) in participation compared with Tasmania's 15% which is the lowest drop.

School VET students in SA (92%) were more than twice as likely to have been involved in their communities while at school than Tasmanian school VET students (42%), where the percentage of school non-VET students involved was the same for both state clusters (67%). Community involvement had dropped to 69% for SA and 31% for Tasmanian school VET students after they left school although their relative positions had remained the same.

An overview of post-school education and training participation by rural school VET and school non-VET students

Of the 270 respondents, 85% had commenced post-school education or training at a university, TAFE or other institution, and/or through a traineeship or apprenticeship. Fourteen respondents indicated they had commenced a course at more than one post-school education institution, for example at both university and TAFE (see figure 9).

A higher percentage of school non-VET students than school VET students went on to some form of post-school education or training (see figure 9) with 92% of male and 94% of female school non-VET students going on compared to 75% of male and 78% of female school VET students (see figure 10). The lower result for school VET males is largely attributable to respondents from the agricultural college in the Western Australia cluster, where many of the males went back to the family farm full-time often in remote areas and did not undertake further education and training. When respondents from this school are excluded the difference between male school VET and non-VET respondents is insignificant, yet the difference for females remains. The post-school participation rates here are higher than that reported by Polesel, Teese and O'Brien (1999a), who found just over 50% of Victorian school VET students had gone on to further education or training. However, these findings are not directly comparable, as Polesel, Teese and O'Brien (1999a) did not include apprenticeships and traineeships as part of further education and training, their data was collected in the first year out of school year whereas this sample includes up to three years of data, and our sample included students who did a number of different post-school courses.

Figure 9: Education and training outcomes comparing school VET participation

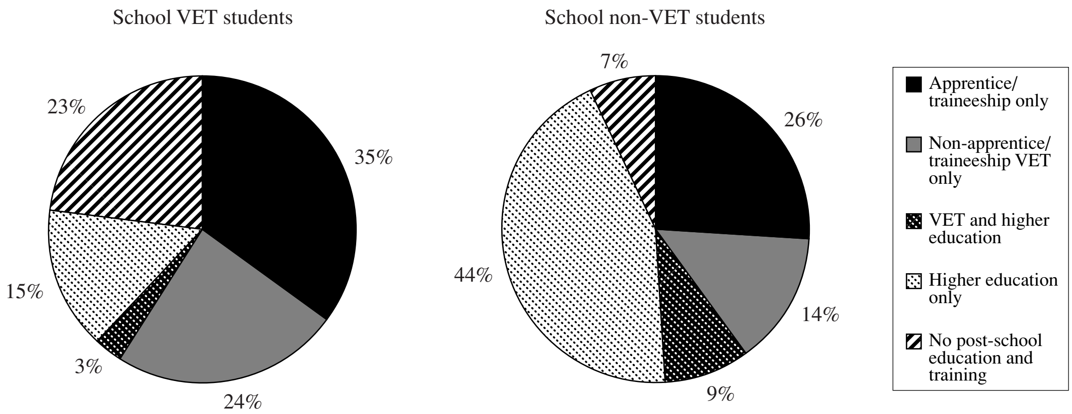
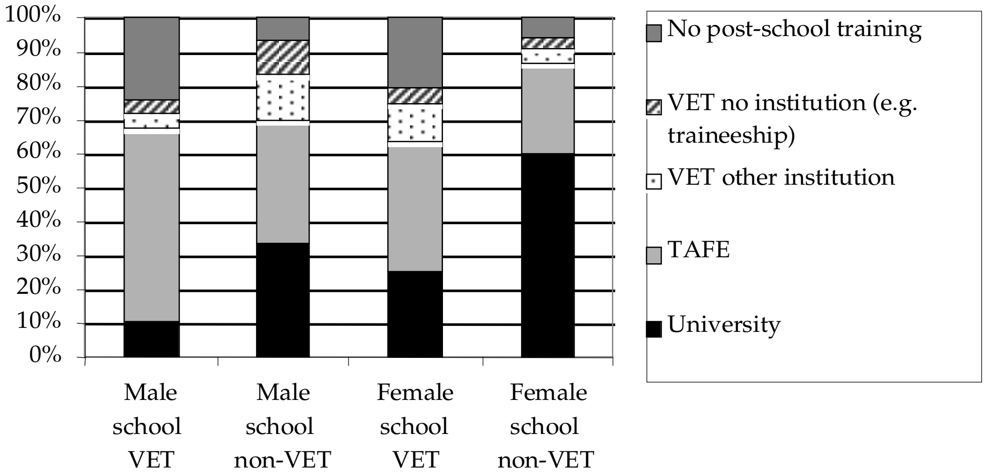


Figure 10: Post-school education and training by school VET participation and gender



Note: χ^2 $p < 0.001$* highly significant for school VET/school non-VET students; significant for male 0.014* and female 0.004* school VET/school non-VET students commencing some form of post-school education and training. χ^2 $p < 0.001$* school VET/school non-VET full-time university study. χ^2 $p = 0.006$* school VET/school non-VET part-time TAFE study.

Broadly, school VET females' post-school education and training participation pattern was more similar to that of males (school VET and school non-VET) than to that of female school non-VET respondents.

There was a significant difference between clusters for school VET students but not school non-VET students when looking at whether or not students went on to post-school education and training (see table 13). All clusters except WA had between 100% (Victoria) and 77% (SA) of school VET students going on to some form of study or training. WA had only 59% doing so, possibly reflecting the limitations of access caused by this state's high proportion of students living in remote areas. A consistent 90 to 95% of school non-VET students went on to post-school education or training across all clusters.

Table 13: **Students who went on to post-school education and training compared by cluster and school VET participation**

State cluster	Post-school education and training			
	School VET		School non-VET	
	No.	*%*	*No.*	*%*
NSW	13	92.3	21	95.2
Victoria	14	100.0	21	95.2
Queensland	10	90.0	24	96.0
SA	13	76.9	12	91.7
WA	49	59.2	29	89.7
Tasmania	33	81.8	30	93.3
Totals	**129**	**93.5**	**101**	**76.5**

The majority (65%) of all students going on to post-school education and training commenced a post-school VET program either through TAFE or other institution, and/or through a traineeship or apprenticeship. Males were more likely than females to go on to post-school VET, although this was mainly due to the greater participation in apprenticeships/traineeships by males. School VET students were more likely than school non-VET students to go on to post-school VET. Overall the most common choice of provider institution for post-school education or training for school VET males was TAFE. University was attended by 42% of respondents, being favoured particularly by school non-VET females (see figure 10).

Of all responding students, school VET and school non-VET, male students were significantly more likely than female students to go on to post-school VET studies in SA, Victoria and NSW. Victoria, NSW and Queensland all had significantly more females than males going on to university study. WA, Tasmania and Victoria all had a significantly higher percentage of school non-VET than school VET students going on to university study. The WA and Tasmanian results may be related to the lack of recognition of school VET subjects for university entrance in WA and Tasmania in 1998, together with the purpose of the school VET program in these state clusters including pathway to local employment.

Full-time study was undertaken by the majority (67%) of those going on to post-school education and training, with more females than males, and school non-VET than school VET students, undertaking this mode of study. The vast majority (96%) of those who commenced university attended full-time while only half of those who commenced a post-school VET program studied full-time. However, once those who did an apprenticeship/traineeship are excluded from post-school VET, the proportion attending a post-school VET institution full-time rises to 65%.

Only 40 respondents (15%) had not commenced any post-school education or training. The majority of these were school VET students (18 males or 25% of male school VET students and 13 females or 22% of female school VET students) (see figure 10 and table A15).

Apprenticeships and traineeships

Over one-third of respondents (n=93; 34%) had commenced an apprenticeship or traineeship since leaving school with all but 15 indicating involvement with a VET institution (TAFE or other institution). Significantly more males (49%) than females (22%) had commenced an apprenticeship or traineeship since leaving school (see table 14). However, the ratio of males to females in the sample (2.3 to 1) going on to this form of post-school education and training commencing an apprenticeship or traineeship was lower than the ratio given in ABS figures (2000a) for 15–64-year-olds[12] doing an apprenticeship in the years 1998–2000 (a ratio of 6.9 to 1[13]). While the two ratios

[12] A gender breakdown was not available for 15–19-year-olds; this age group comprised approximately half the total number of apprentices for that year.

[13] ABS *Transition from Education to Work* 1998b, 1999a and 2000a

are not strictly comparable, the figures suggest there may be a growing number of younger females participating in apprenticeships and traineeships.

Table 14: Commenced an apprenticeship/traineeship by school VET participation and gender

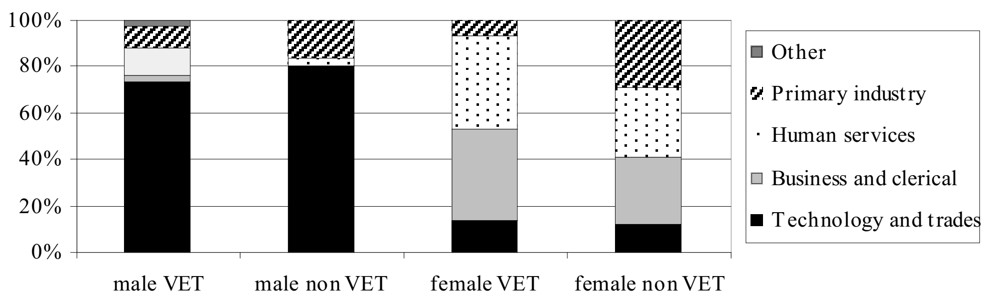
	Commenced apprenticeship/traineeship		
	No.	%	Total
Male school VET	34	46.6	**73**
Male school non-VET	27	51.9	**52**
Female school VET	14	23.7	**59**
Female school non-VET	18	20.9	**86**
Total	**93**	**34.4**	**270**

There was little difference in the percentages of school VET and school non-VET students going into traineeships and apprenticeships. This finding is contrary to those of Fullarton (2001) and Ball and Lamb (1999–2000) who found a strong link between school VET participation and uptake of apprenticeships.

All clusters except WA and NSW had between 41 and 48% of all students going on to an apprenticeship or traineeship of some kind. NSW had only 18% and WA only 23% going on to this type of training, which was significant when compared to other clusters but not by school VET participation for any cluster.

There was a gender difference in choice of apprenticeship and traineeship fields. Apprenticeships for males were principally in the area of technology and trades, followed by primary industry, and human services. For females, the choices were more varied, with business and clerical and human services the most frequent choice, followed by primary industry and technology (see figure 11).

Figure 11: Area of apprenticeship/traineeship by school VET participation and gender



Note: χ^2 p values 0.525 male school VET/school non-VET; 0.434 female school VET/ school non-VET; <0.001* (highly significant) comparing male with female apprenticeship/traineeship choices.

Most of those who had commenced a traineeship or apprenticeship had enrolled at TAFE either part-time (43%) or full-time (28%) at some time since leaving school, not necessarily in conjunction with their traineeship or apprenticeship.

Over 80% of those who had commenced an apprenticeship or traineeship since leaving school were currently employed full-time, compared to 45% overall. Respondents who had not taken up apprenticeships were more likely to be working in casual or part-time jobs, although many of these may be studying full-time (see table A9).

There is a strong relationship between area of post-school apprenticeship and area of current employment (see table A16). School VET students who commenced apprenticeships or traineeships after leaving school were working principally in the area of technology and trades, followed by human services. Most of those who had commenced an apprenticeship but did not do VET study at school now work in technology and trades or primary industry. School VET students who had not undertaken an apprenticeship are most likely to be working in the human services or primary industry. Those who did not study VET at school and have not subsequently commenced an apprenticeship are most likely to be working in human services.

An overview of post-school employment participation by rural school VET and school non-VET students

Most respondents (89%) were employed at the time of the survey, with no significant difference between school VET and school non-VET students or males and females (see table A17) or between clusters. These results differ from Fullarton (2001) in so far as she found school VET students were more likely to be employed one year out of school than school non-VET students. Ninety-two per cent of respondents had had at least one job since leaving school and over 66% had had more than one job (see table A18).

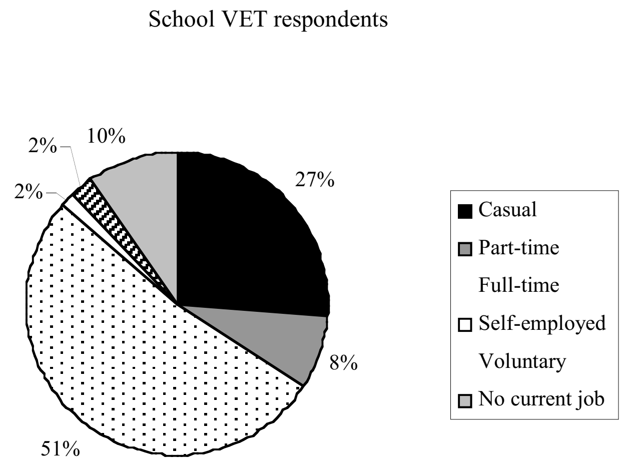
Almost half (45%) of all respondents had a full-time job, with school VET students (51%) more likely to be employed full-time than school non-VET students (38%) (see figure 12 and table A17). School non-VET students were more likely to be employed on a casual basis, although this is probably partially due to the high proportion commencing full-time study (71% school non-VET cf 42% school VET) (see table A9). Fullarton (2001) also found school VET students were more likely to be employed full-time, although the levels she reports for school VET students (32%) and school non-VET (19%) are much lower than found in this study. This is probably due to the increased period out of school, as Fullarton (2001) and Polesel, Teese and O'Brien (1999a) both noted that participation increased over time.

Differences in current employment status tended to be more significant according to gender than school VET participation (see figure 13 and table A17). Males were significantly more likely to be currently employed full-time (68% male, 35% female) and females were significantly more likely to have part-time (3% male, 15% female) and casual employment (25% male, 47% female), although the majority (77%) of females without full-time employment had commenced full-time study. There were no significant differences between clusters in employment status.

Of the 30 respondents without a current job, only seven had never had a job since leaving school and all but three had commenced full-time study with another commencing part-time study.

The overall employment rate of the sample is considerably higher than the national average for 1999–2000, which was 48.8% for 15–19-year-olds and 74.2% for 20–24-year-olds (ABS 2001). The results also suggest that the sample has a lower unemployment rate than the average for 15–19-year-olds (21.9%) and 20–24-year-olds (10.5%) in Australia (ABS 2001), although this may be the result of self-selection by respondents.

Figure 12: Current employment outcomes comparing school VET participation



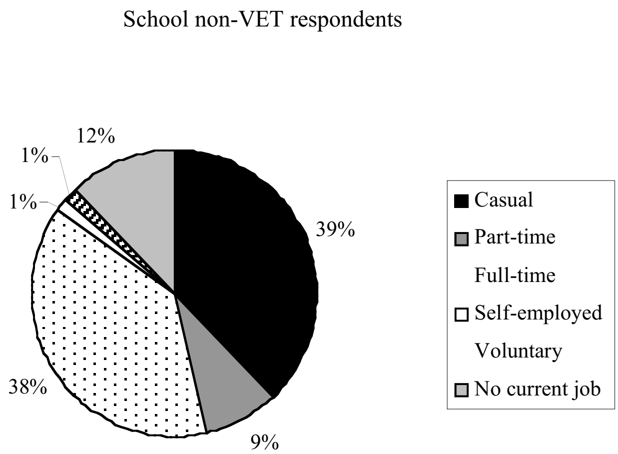
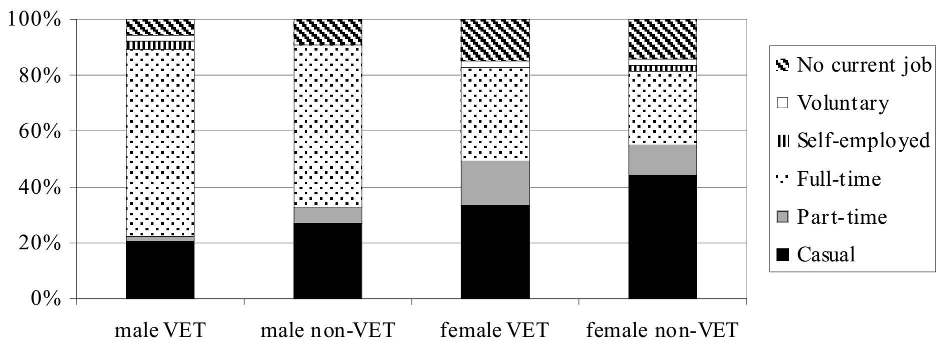


Figure 13: Current employment status by school VET participation and gender

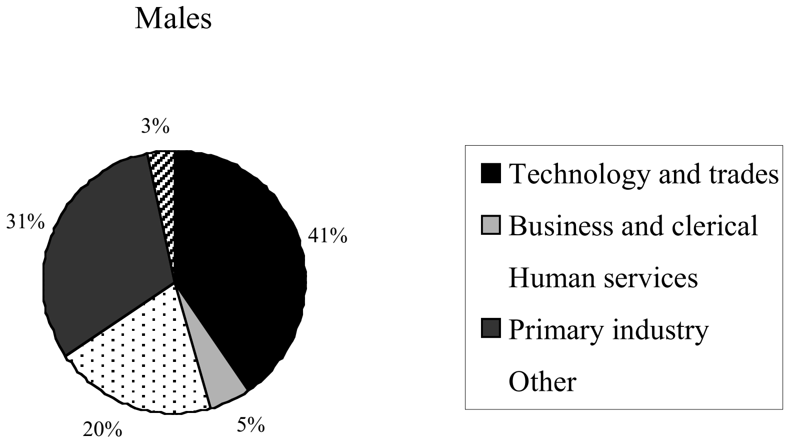


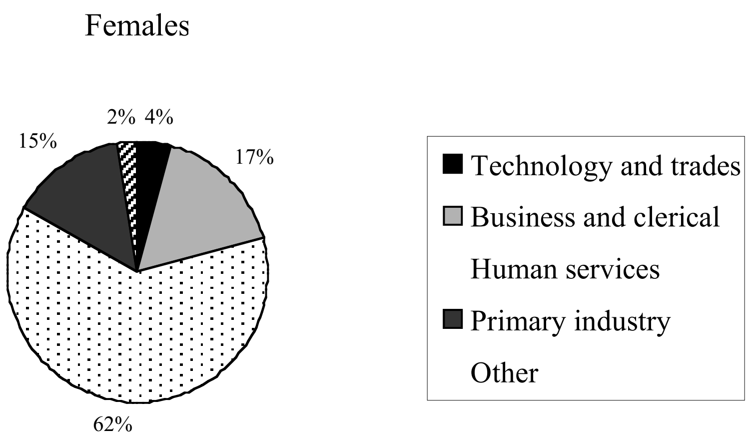
Note: χ^2 p values 0.228 male school VET/school non-VET; 0.46 female school VET/ school non-VET; 0.001* male/female school VET; 0.013* male/female school non-VET.

Industry of employment

The three main industries of employment for both school VET and school non-VET students were human services, primary industry and technology and trades (see table A19). Males were currently employed mainly in the areas of technology and trades (41%) and primary industry (31%), while females were mainly employed in human services (62%) and business and clerical (17%), consistent with traditional gender choices (see figure 14 and table A19).

Figure 14: Industry area of current job





Current employment by cluster for respondents was mainly in the area of human services in the NSW (65%), Tasmania (41%), Victoria (37%) and Queensland (34%) clusters. For SA it was principally in technology and trades and primary industry (both 32%) and WA in primary industry (32%) then human services (30%). The area of current employment for respondents who did a school VET course closely follows the area of this course.

Jobs in primary industry were more likely to be full-time for school VET students than for school non-VET students as are jobs in the human services area (see table A20). Current employment in technology and trades and business and clerical was predominantly full-time for both school VET and school non-VET participants. The predominance of casual employment in the human services area for school non-VET students and for females may reflect the fact that this type of work is attractive for tertiary students, rather than indicating a long-term career choice, as 72% of casual employees in human services had commenced full-time study. Business and clerical and human services provided the most full-time jobs for both school VET and school non-VET females (see table A21).

An overview of the responses of school VET students

This section focusses specifically on school VET student responses, including by state cluster. As explained in the methodology, clusters differ according to the level of average regional growth, and according to the main purpose(s) of the school VET program (see table 15). These purposes were not mutually exclusive; hence, analyses were done for school VET students comparing outcomes by both cluster and purposes.

Table 15: State school clusters in order of regional growth levels comparing purposes of school VET courses

		Cluster purposes			
Location of site by state and statistical division	Average regional growth level in statistical division	General work skills	Pathways to local employment	Alternative to mainstream curriculum	Number of school VET students
Queensland (Wide Bay-Burnett)	High				10
Victoria (Barwon)	Medium High				14
Western Australia (Wheat Belt)	Medium				49
New South Wales (two clusters: Northern/South Eastern)	Medium				13
South Australia (South East)	Medium Low				13
Tasmania (Mersey Lyell)	Low				33
Number of school VET students		70	95	24	132

Results of any comparisons by cluster should be considered with care, as response rates for each cluster varied from a low of 11% in Queensland to a high of 24% in South Australia with a national average of 17% (see Methodology table 5).

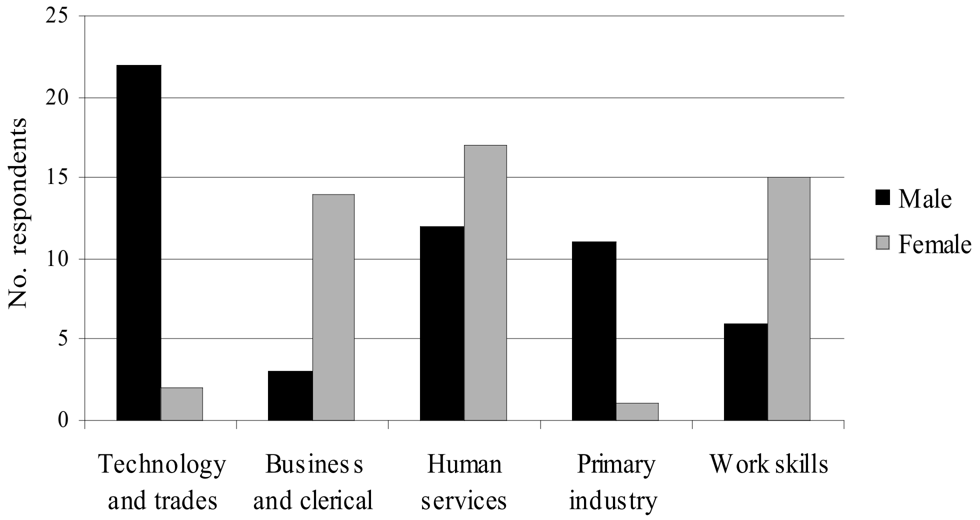
Profile of school VET students

As noted earlier, 132 respondents took part in school VET courses in senior secondary school. Only 18 students took part in school-based apprenticeships. For the purposes of this study, these were considered as part of the total sample of school VET students. Eighteen school VET students, all of whom went to the same school in WA, were unaware that they had been doing a VET course at school, as explained in the Methodology chapter. These students were also considered as part of the total sample of school VET students and were included in analyses of school VET responses (although where their particular responses were missing this was considered as 'no response' or missing data).

School VET courses were aggregated into five broad areas (technology and trades, business and clerical, human services, primary industry, and work skills) as described in the Methodology chapter. Traditional gender choices were evident with males predominating in the technology and trades and primary industry areas and females in human services and business and clerical areas.

However, human services (predominantly tourism and hospitality) also attracted a large number of males (see figure 15).

Figure 15: Subject areas of school VET courses compared by gender



Note: χ^2 p value < 0.001* highly significant comparing male and female school VET students

The sample of school VET students in the study showed a large variation in school VET study area with significant differences when compared by cluster (see table 16). Human services was the principal area of study for school VET respondents in the Victorian, Queensland and NSW clusters. The WA and Tasmanian state clusters had a broad range of subject areas represented, and this may have partly been the result of there being a larger sample from these two clusters. SA and WA were the only state clusters with respondents studying primary industry.

Table 16: School VET study area compared by state cluster

State cluster	Technology and trades	Business and clerical	Human services	Primary industry	Work skills	Total
	%	%	%	%	%	No.
NSW	8.3	33.3	41.7	0	16.7	**12**
Victoria	46.2	0	53.8	0	N/A	**13**
Queensland	16.7	33.3	50.0	0	N/A	**6**
SA	27.3	0	18.2	45.5	9.1	**11**
WA	20.7	24.1	10.3	24.1	20.7	**29**
Tasmania	21.9	12.5	28.1	N/A	37.5	**32**
Total %	**23.3**	**16.5**	**28.2**	**11.7**	**20.4**	**103**

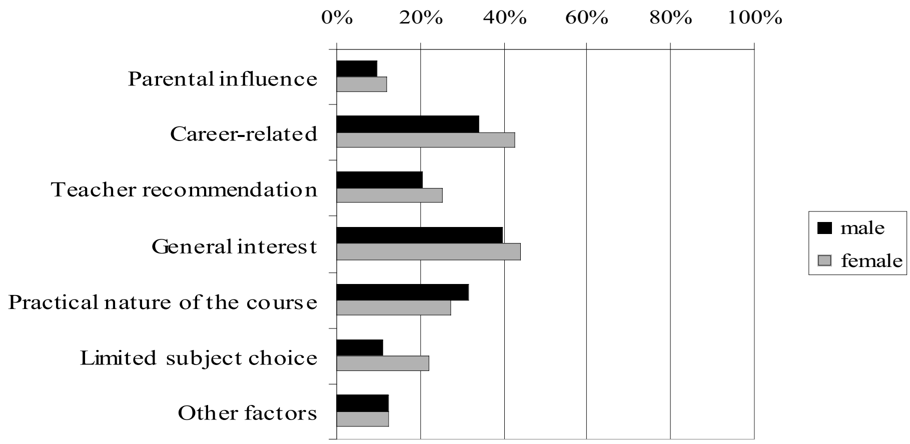
Note: N/A = course area not available in this cluster in 1998

The school VET subject areas in table 16 broadly reflect the courses offered in those clusters (see Methodology) in 1998.

What motivated students' choice of school VET courses

Students chose school VET courses mainly for general interest or as a career pathway. There was no significant difference between genders in the reasons given other than 'Limited subject choice' which was a more important factor for females than for males (see figure 16).

Figure 16: What motivated students' choice of school VET courses



Note: χ^2 p value 0.045* significant for 'Limited subject choice' females/ males

There were significant differences in students' motivation in undertaking school VET courses when responses were compared by cluster (see table 17).

General interest drove course selection in Victoria, NSW and South Australia. Career interests took precedence in Tasmania, while WA students chose on the basis of the practical nature of their courses. Lack of subject choice was the main motivating factor for Queensland students.

From the perspective of school VET purpose, those clusters with the purpose of *general workplace skills and knowledge* (NSW, Victoria, Queensland and Tasmania) and *alternative to the mainstream curriculum* (Victoria and Queensland) generally had strong (either their strongest or second strongest) associations with the student motivation of general interest. Those clusters with the purpose *pathway to local employment* (SA, WA and Tasmania) also had strong associations with the motivation of general interest but, in addition, career-related reasons and practical nature of the course.

Table 17: What motivated students to choose school VET courses comparing responses by cluster

State cluster	**School VET motivation %**							
	Parental influence	Career related	Teacher recommended	General interest	Practical nature of course	Limited subject choice	Other influence	**Total no.**
NSW	15.4	30.8	23.1	61.5	30.8	46.2	23.1	**13.0**
Vic	7.1	64.3	35.7	78.6	50.0	7.1	7.1	**14.0**
Qld	0.0	20.0	10.0	30.0	0.0	40.0	0.0	**10.0**
SA	30.8	46.2	30.8	53.8	46.2	38.5	7.7	**13.0**
WA	12.9	35.5	29.0	35.5	45.2	12.9	16.1	**31.0**
Tas	9.1	54.5	24.2	45.5	24.2	3.0	18.2	**33.0**
Total no.	**14.0**	**50.0**	**30.0**	**55.0**	**39.0**	**21.0**	**16.0**	**114.0**
Total %	**12.3**	**43.9**	**26.3**	**48.2**	**34.2**	**18.4**	**14.0**	**197.3**

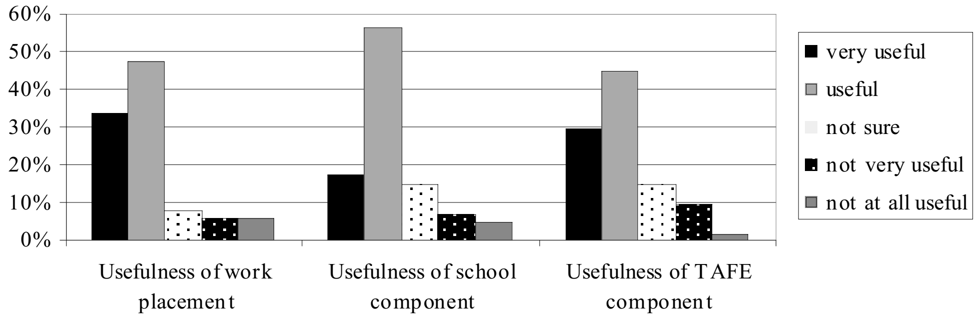
Note: Row percentages exceed 100% as multiple responses were permitted.

The influence of training components of school VET courses on student satisfaction

An attempt was made to have school VET students assess the value to them, since leaving school, of the three main components used to provide training for school VET courses: their school component, their workplace component (school VET courses often include a work placement where students work, usually one day per week, in a place of employment relevant to their school VET area), and, in some cases, their TAFE college or other training institution component. These questions seem to have been misunderstood by some respondents. For example, of the 103 students responding to these questions, 90 implied by their responses that they had undertaken a work placement when only 74 reported elsewhere they had done so. The accuracy of these responses cannot be verified so they should be considered with care.

Nevertheless the great majority of those responding felt that the things they had learnt in their work placement (n = 89, 81%), in school (n = 103, 74%) and at a TAFE or other institution (n = 74, 74%) had been useful or very useful to them since leaving school (see figure 17).

Figure 17: The usefulness to students of the training components of school VET courses after they had left school

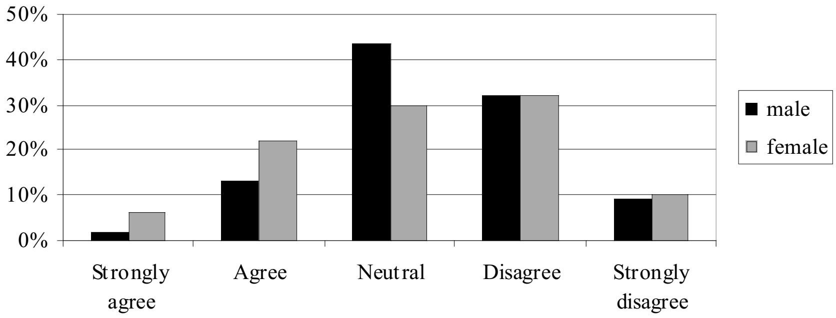


Individual outcomes of participation for school VET students

The aim of these questions was to find out if participation in a school VET course helped students to stay on at senior secondary school, to improve literacy and numeracy skills, and to be more involved in their communities.

The responses to these questions tended to be neutral, particularly for males, or negative (n = 103 respondents: see table A22). From the findings it appears that participation in a school VET course had little influence on students' decision to continue with secondary study, with 42% of all students giving a negative response to this question (see figure 18).

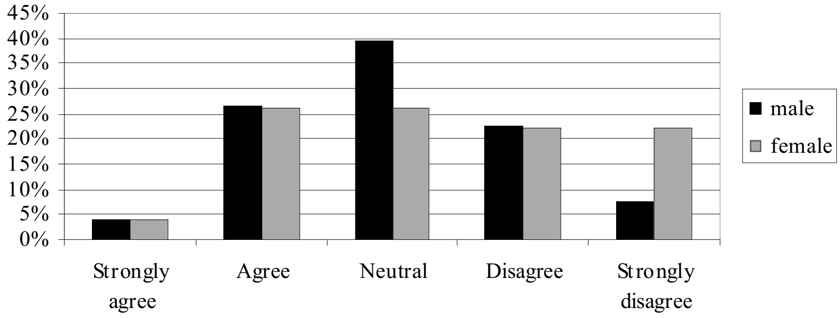
Figure 18: Participation in school VET course influenced students' decision to continue with senior secondary study



Note: χ^2 p value 0.475 male/female.

There was a polarised response to the statement ‘my school VET course helped improve my literacy and numeracy skills’, with 30% of students agreeing or agreeing strongly that it did help but with 22% of females disagreeing strongly (see figure 19).

Figure 19: School VET course helped students to improve literacy and numeracy skills



Note: χ^2 p value 0.273 male/ female.

There were significant differences between clusters in the perceived usefulness of school VET courses, with 48% of Tasmanian school VET students (n=15) agreeing that their school VET course helped improve literacy and numeracy skills. Victorian (75%, n=9) and NSW (58%, n=7) students were more likely to disagree with this outcome (see table 18).

Table 18: Responses to questions on school VET course and literacy/numeracy, by cluster

State cluster	Strongly agree %	Agree %	Neutral %	Disagree %	Strongly disagree %	Total numbers
NSW	16.7	8.3	16.7	33.3	25.0	**12**
Vic	0.0	16.7	8.3	75.0	0.0	**12**
Qld	0.0	28.6	57.1	0.0	14.3	**7**
SA	0.0	15.4	69.2	0.0	15.4	**13**
WA	0.0	25.0	42.9	14.3	17.9	**28**
Tas	6.5	41.9	19.4	19.4	12.9	**31**
Total %	**3.9**	**26.2**	**33.0**	**22.3**	**14.6**	**103**

Few students agreed that their school VET course made them feel closer to and more involved in their community. Males and Victorian and NSW students were least likely to agree (see figure 20).

Work placement students were more likely to agree than non-work placement students that their school VET course had a positive impact in the three statement areas (influencing their decision to stay on at senior secondary school, improving their literacy and numeracy skills, and involving them in the community) (see figure 21).

Figure 20: Participation in school VET course made students feel closer to and more involved in their communities

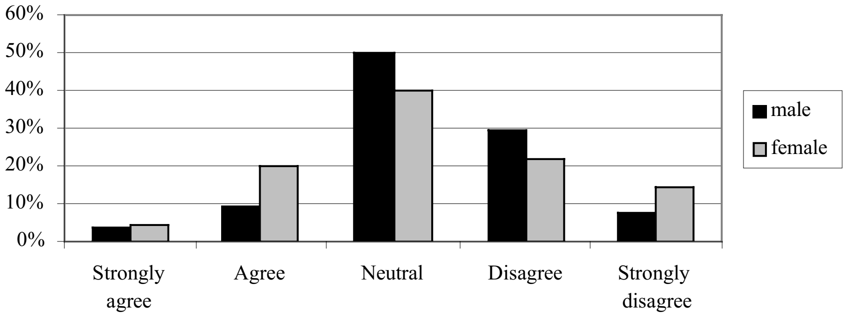
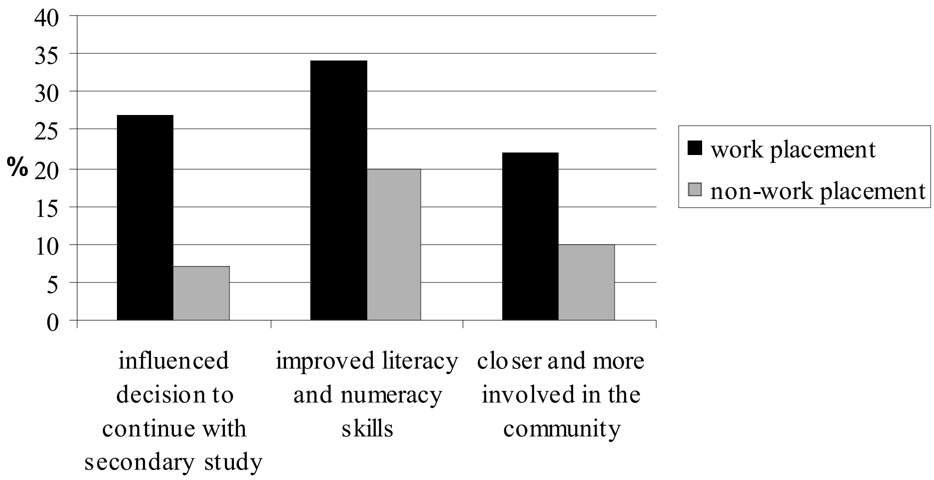


Figure 21: Work placement students were more likely to agree with statements about the value of their school VET course than non-work placement students



Note: χ^2 p value 0.056 work placement/non-work placement 'influenced decision to continue secondary school'; 0.353 'improved literacy and numeracy skills'; 0.085 'feel closer to community'.

General comments from students about their school VET courses

Students were given the opportunity to comment on the features of their school VET courses that were most useful to them in their work or study since leaving school. As the question asked for positive responses (i.e. 'usefulness') it is not surprising that these greatly outnumbered negative comments (96 positive; 7 negative). Provision of general and specific skills and knowledge (28), the practical nature of courses (13), and advantage in the labour market (11) including knowledge of the industry area (9) were the main areas of positive comment. Defects in the course structure such as being too basic (2) and the skills learnt not being useful (2) were the main areas of complaint.

What formal recognition did students receive for their school VET study

Of the 98 school VET students who reported they had received formal recognition for their school VET courses, 16 received a State Certificate of Education alone, 27 received both a State Certificate and at least one other certificate, and 55 received another certificate alone (see table 19). Overall, school VET students achieved accreditation in the form of a moderate percentage (42%) of State Certificates, but a high percentage (80%) of school VET certificates. Care needs to be taken in interpreting these findings as respondents were asked to self report their formal recognition status. It seems likely that a number of students under-reported their qualifications, given that all states except Tasmania operated a dual recognition system for approved school VET courses (State

Certificate of Education plus AQF accreditation) in 1998. In addition another 14 students who completed their senior school study did not answer this question.

Table 19: Qualifications received by students for school VET courses

	State Certificate of Education	Statement of Attainment	Certificate I	Certificate II	Certificate III	Other certificate	Total number of certificates
State Certificate of Education	**16**	7	7	17	1	4	**43**
Statement of Attainment	7	**8**	6	6	2	4	**22**
Certificate I	7	6	**13**	5	2	2	**27**
Certificate II	17	6	5	**15**	3	0	**35**
Certificate III	1	2	2	3	**4**	0	**7**
Other certificate	4	4	2	0	0	**10**	**19**

The role of work placements in school VET courses

Although school VET students were not asked specifically if they did a work placement, this figure could be calculated from other key questions. Over half the school VET respondents (n=74; 56%) indicated they had undertaken a work placement as part of their courses, with slightly more females than males (see table A23). Again, care needs to be taken in interpreting these findings as, given the profile of the school VET courses offered in each cluster (see Methodology), it seems likely that the number of respondents participating in a work placement was higher than reported. Furthermore, 18 respondents indicated they had done a school-based apprenticeship/traineeship of which 15 indicated they had done a work placement. These 15 students were included as work placement students in the analysis.

There was a wide variation in the numbers of school VET students undertaking a work placement when compared by cluster, from a high 94% (n=31) in Tasmania to a low 10% (n=1) in Queensland (see table 20).

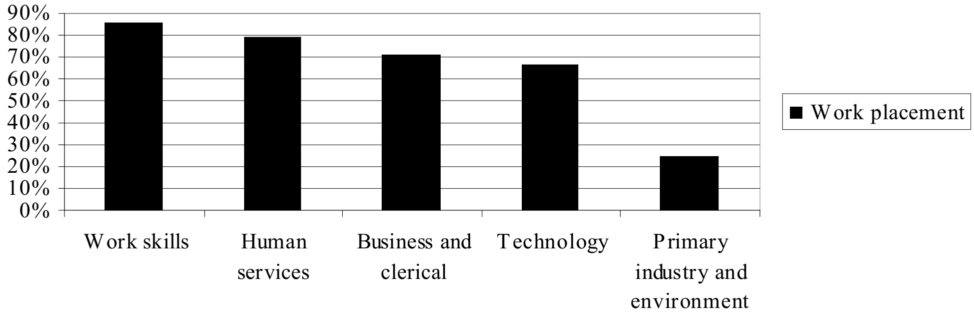
Table 20: School VET students undertaking work placements comparing results by state clusters

State cluster	Work placement:				Total number of students
	Yes		No		
	No.	*%*	*No.*	*%*	
NSW	7	53.8	6	46.2	**13**
Vic	7	50.0	7	50.0	**14**
Qld	1	10.0	9	90.0	**10**
SA	10	76.9	3	23.1	**13**
WA	18	36.7	31	63.3	**49**
Tas	31	93.9	2	6.1	**33**
Total	**74**	**56.1**	**58**	**43.9**	**132**

Males were significantly less likely than females to do a work placement in WA and more likely in NSW.

The school VET course area most likely to have students doing a work placement was work skills (86%), whereas only 25% of primary industry school VET students indicated a work placement (see figure 22).

Figure 22: Percentage of respondents in each school VET area indicating they undertook a work placement



Note: χ^2 p value 0.004* significant for school VET area by work placement

Most students (62%) did their work placement within 25 kilometres of their school. A smaller group of 15% did it more than 25 kilometres away, while a further 23% did some within and some over 25 kilometres from their school.

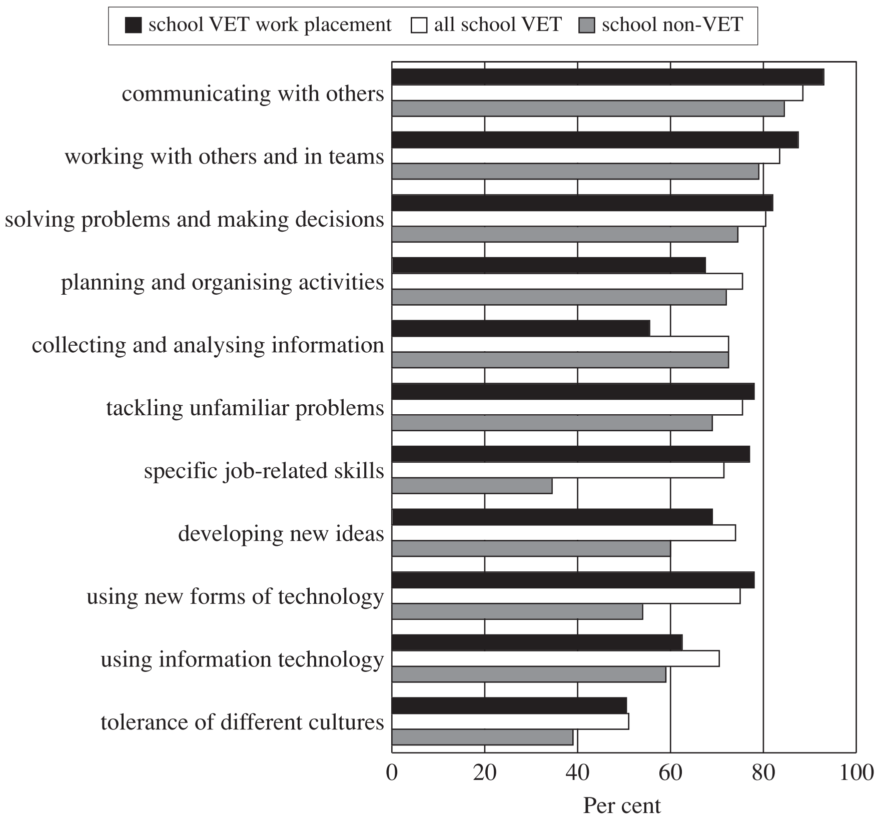
Eighteen students (24%) were offered casual or part-time work and three (4%) were offered an apprenticeship or traineeship by their work placement employer while still at school. Twenty-one students (28%) were offered employment of some kind and eight (11%) were offered an apprenticeship or traineeship by their work placement employer after leaving school (see table A24 and the employment section later in this chapter for greater detail). There were few significant differences in employment and apprenticeship outcomes from work placements when compared by cluster. Other employment outcomes for work placement students are discussed in greater detail in the employment section.

The value of work placements in developing general and specific job skills

School VET participants doing a work placement as part of their course were generally positive about the value of their work placement in developing general and job-specific skills. Agreement was greatest that their work placement had assisted them in developing skills and knowledge in 'communicating with others' and least for 'understanding and tolerance of people from different cultures' (see figure 23). Work placement students indicated similar levels of satisfaction with skills gained from their work placement as school VET students did with their senior school years. As with school VET students, work placement students expressed greater satisfaction in most learning outcome areas than school non-VET respondents. However, it should be noted that the results for work placement students are not directly comparable, as work placement students were reporting only about their work placement, whereas the earlier question to all students (school VET, including work placement students, and school non-VET) asked about their overall senior secondary school experience. Nevertheless, these findings concur with British research (Blackwell, Bowes & Harvey 2001) showing that work placements were responsible for positive student perceptions of the learning experience and suggest a longer-term positive attitude to work placements from school VET students.

The benefit of work placements to developing interpersonal skills found here is also supported by Misko's (1998b) and Smith and Green's (2001) findings showing the value of work placements to developing students' teamwork and communication skills. However, in contrast to the ranking of skills gained reported here, Misko (1998b) found the majority reported that the main area of learning in work placements was in the technical skill area (computer, general clerical, and machinery and equipment operation), followed by interpersonal or generic skills (team work and communication), and finally, by industry-specific skills (knowledge of particular trades or professions).

Figure 23: Comparison of skills gained from work placements with skills gained from senior school studies by school VET and non-VET students



When looking at perception of skills gained by school VET industry area, the only major difference between industry areas was for the skill 'using new forms of technology'. Those whose work placement was in the human services area were less likely to agree that their work placement was useful in developing this skill (see table A25).

The only area where there was a significant difference in responses between genders was the role of work placement in developing skills using information technology (computers and the internet) where females were significantly more likely to agree or strongly agree that this was useful.

Outcomes of participation in school VET programs: Education and training

This chapter follows on from the overview of school VET post-school education and training outcomes, which included a comparison of male and female school VET student outcomes. This section will focus on other aspects such as school VET cluster relationships; the relationship between the school VET industry area and area of post-school education and training, including area of apprenticeships and traineeships; recognition or credit received for a school VET course towards post-school study; further analysis of the value of senior school years to school VET and non-VET students; post-school education outcomes for students with different motivation for doing a school VET course, for school VET and school non-VET students who placed a low value on their senior school years and for students participating in school VET programs with different purposes.

State cluster and school VET post-school education and training outcomes

As described earlier, there was a significant difference between clusters for school VET students when looking at whether or not students went on to post-school education and training. There was also a significant difference between clusters in the percentage of school VET students going on to post-school VET. Victorian cluster school VET students were most likely to go on to post-school VET and NSW cluster school VET students least likely (see table 21).

Table 21: School VET students going on to post-school VET compared by cluster

State cluster	Post-school VET		No post-school VET		Total no. school VET students
	No.	%	No.	%	
NSW	6	46.2	7	53.8	**13**
Vic	12	85.7	2	14.3	**14**
Qld	8	80.0	2	20.0	**10**
SA	8	61.5	5	38.5	**13**
WA	23	46.9	26	53.1	**49**
Tas	24	72.7	9	27.3	**33**
Total	**81**	**61.4**	**51**	**38.6**	**132**

School VET industry area and post-school education and training

School VET courses were aggregated into five broad areas as described earlier in the school VET profile section. There was no significant difference between school VET areas of study in terms of likelihood of going on to post-school education and training, though primary industry students were least likely.

At least half of the students in all school VET areas went on to further study through TAFE (see table 22). The number of school VET students going on to university was too small to observe any meaningful relationship between school VET and university area of study.

Table 22: Type of post-school education and training institution by area of school VET course

Area of school VET course	Type of post-school education and training institution							
	University		TAFE		Other institution		Total	
	No.	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*
Technology and trades	2	11	15	79	2	11	**19**	**100**
Business and clerical	5	36	7	50	2	14	**14**	**100**
Human services	6	27	14	64	2	9	**22**	**100**
Primary industry	1	11	7	78	1	11	**9**	**100**
Work skills	4	24	11	65	2	12	**17**	**100**
Total	**18**	**22**	**54**	**67**	**9**	**11**	**81**	**100**

Over half of the school VET participants (n=71) reported undertaking post-school education and training (including traineeships and apprenticeships) in the same broad industry area as their school VET course (see table 23). There was a particularly high correlation between the school VET study of technology and trades and post-school training in that area with 83% of these students going on to studies in the same area after school. This supports findings by Misko (2001) and ECEF (2002) regarding the link between school VET study in the information technology area and subsequent education and training in a related area.

Table 23: Area of post-school education and training by school VET area

Area of school VET course	Area of post-school education and training										
	Technology and trades		Business and clerical		Human services		Primary industry		Other		Total
	No.	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*	*No.*
Technology and trades	30	**83**	1	3	3	8	2	6	0	0	**36**
Business and clerical	1	6	10	**56**	6	33	0	0	1	6	**18**
Human services	0	0	5	14	26	**72**	4	11	1	3	**36**
Primary industry	8	53	0	0	1	7	5	**33**	1	7	**15**
Work skills	12	39	5	16	14	45	0	0	0	0	**31**
Total	**51**	**38**	**21**	**15**	**50**	**39**	**11**	**8**	**3**	**2**	**136***

Note: * total number of school VET student responses is greater than 132 as some respondents undertook more than one post-school education and training course

School VET area and apprenticeships/traineeships

There was a strong relationship between school VET area and area of post-school apprenticeship/traineeship, with around 70% of those 32 students who undertook a VET course at school in an industry area (that is, excluding the generalist work skills area) going on to do an apprenticeship or traineeship in a similar area (see table 24). This relationship was stronger for males than for females, largely due to the number of male technology and trades students continuing in the same broad area.

When students were asked specifically whether they had done or were doing an apprenticeship or traineeship related to the VET course of study they did at school, only 50% of those responding indicated it was related to their school VET course. The disparity with the finding of an around 70% correlation noted above is probably due to respondents answering in terms of specific industry area, rather than broad area categories as listed in table 24.

Table 24: Area of post-school apprenticeship/traineeship by area of school VET study

Area of school VET course	Industry area of apprenticeship/traineeship											
	Technology and trades		Business and clerical		Human services		Primary industry		Other		Total	
	No.	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*
Technology and trades	14	**88**	1	6	0	0	1	6	0	0	**16**	**100**
Business and clerical	0	0	2	**67**	1	33	0	0	0	0	**3**	**100**
Human services	0	0	1	11	5	**56**	2	22	1	11	**9**	**100**
Primary industry	3	75	0	0	0	0	1	**25**	0	0	**4**	**100**
Work skills	5	56	2	22	2	22	0	0	0	0	**9**	**100**
Total	**22**	**54**	**6**	**15**	**8**	**20**	**4**	**10**	**1**	**2**	**41**	**100**

There was no significant relationship between school-based apprenticeships or traineeships and post-school apprenticeships/traineeships. Eight of the 18 school-based apprentices (44%) went on to a post-school apprenticeship compared with 37% of those school VET students who had not participated in a school-based apprenticeship.

Recognition for school VET courses in post-school education and training

School VET students were asked to indicate whether they had done an apprenticeship/ traineeship or any other further study related to their school VET course, and if so, whether they had received any recognition or credit towards their post-school course based on their school VET course. Over half of the respondents who indicated their post-school education and training was related indicated they had received such recognition (see table 25). Of these, it was students who went on to an apprenticeship, traineeship or other TAFE course related to their school VET course who were generally successful in gaining credit. This represents about the same total percentage gaining recognition but a much higher percentage of apprentices and TAFE students than in Misko's (2001) study of students in their first year (about three months) out of school.

Table 25: Recognition for school VET course in post-school training

Relationship between post-school training and school VET course	Gained recognition				
	Yes		No		Total
	No.	*%*	*No.*	*%*	*No.*
Post-school training related to school VET course	22	59.5	15	40.5	**37**
Apprenticeship/traineeship related to school VET course	14	66.7	7	33.3	**21**
Apprentice/traineeship not related to school VET course	3	60.0	2	40.0	**5**
TAFE course related to school VET course	17	70.8	7	29.2	**24**
TAFE course not related to school VET course	2	18.2	9	81.8	**11**

Note: many students who did an apprenticeship/traineeship also attended TAFE

There were differences between course areas in terms of gaining recognition, with human services (principally hospitality and tourism: 83%) and technology and trades (63%) being most likely to be granted credit, and business and clerical and work skills least likely. Although the number is small, doing a school-based apprenticeship or traineeship did not convey any advantage in gaining credit for later study or training when compared to other school VET courses, as about 50% of respondents in both groups indicated they had gained credit.

The effectiveness of aspects of school VET courses including motivation and purpose in preparing students for post-school training

School VET student motivation and post-school education and training outcomes

In the earlier section providing a profile of school VET students, the main factors motivating school VET students to do a school VET course were described (parental influence, career related reasons, teacher recommendation, general interest, practical nature of course, limited subject choice, other influence; see figure 16). Some interesting differences emerge in the post-school education and training outcomes of students with differing motivations, although it must be remembered that this was a multi-response question so students could elect more than one motivation.

Those students with a definite career path in mind when they undertook school VET courses showed distinctive educational outcomes. They were less likely to finish Year 12, more likely to do a work placement and for this to have resulted in an offer of an apprenticeship or traineeship either while still at school or after having left school. Their school VET course was less likely to be in the work skills area and more likely to be in the human services area. They were more likely to go on to post-school education and training, and for this training to be related to their school VET course. In terms of senior school retention as an outcome of school VET courses, these results would not be considered successful; however, they appear to have been highly successful in terms of a career pathway with training.

Those students for whom the appeal of their school VET course was its practical and hands-on nature were more likely to feel that their senior school years were just filling in time and not useful for employment. They were negative about the role of their school VET course in helping improve literacy and numeracy skills but were more likely to go on to do an apprenticeship/ traineeship related to their school VET course. Not surprisingly, school VET courses in the business and clerical area did not appeal to them.

Students motivated by general interest in the field of their school VET course studied a broad range of areas. They were more likely than students with other motivations to study human services, technology and trades and work skills, and less likely to do business and clerical studies. They were more likely to be attending a school with the school VET purpose providing general work skills rather than those providing a local employment pathway.

Those students who chose their school VET course on the basis of limited subject choices were generally somewhat negative in their perceptions and outcomes. They did not feel their senior school years had been useful for post-school study or employment. They were less likely to go on to do an apprenticeship or traineeship or to do further study related to their school VET course. That course was considerably less likely to have been in the technology and trades area. However, they were more likely to have gone on to full-time university study than other school VET respondents. They were less likely to have attended a school with the VET course purpose of providing a pathway to local employment.

A comparison of schools' principal purposes in providing school VET courses and their differing educational outcomes

As explained in the earlier section providing an overview of school VET responses, there were three purposes or aims for school VET courses (general workplace skills and knowledge, pathways to local employment, an alternative to the mainstream curriculum) and these were not mutually exclusive. The discussion here provides a very broad and general profile of each group of students and emphasises the differences between the outcomes for each group.

Pathway to local employment

Three of the six school clusters (SA, WA and Tasmania) gave provision of a *pathway to local employment* as their main purpose for school VET courses (accounting for 72% of school VET respondents). These clusters included respondents from all school VET subject areas, being significantly more likely to include work skills and significantly less likely to include human services.

The education and training outcomes associated with this purpose appeared to be largely consistent with an aim of catering principally for the less academically inclined students. There was no one particular motivating factor indicated by the respondents from these clusters for doing a school VET course, though they were *less* likely to be motivated by limited subject choice.

These students were more likely to value school poorly, and less likely to find school useful to post-school study, possibly because they were less likely to have gone on to post-school education and training. However, they were most likely to agree that their school VET course had influenced their decision to continue with senior secondary school and helped improve their literacy and numeracy skills. They were also the most likely to agree that their senior secondary study had helped them gain skills in solving problems and making decisions.

They were more likely than not to have participated in a work placement and were the most likely to have received an offer of employment from their work placement employer. School VET students from these clusters were the only ones to have been offered an apprenticeship/ traineeship from their work placement while at school, and accounted for seven of the eight apprenticeship/traineeships offered to work placement students after having left school.

This group was least likely to receive a school VET Certificate.

Provision of general workplace skills and knowledge

This is the most popular purpose of the VET programs given by schools, nominated by four of the six clusters (NSW, Victoria, Queensland and Tasmania) but applying to only 53% of school VET respondents. This purpose category included respondents from most school VET subject areas, principally those undertaking human services (χ^2 p value < 0.001*) but excluding primary industry.

Students doing a school VET course with this purpose were less likely to complete Year 12 and more likely to leave school early. Again, there was no one dominant motivating factor for enrolling in school VET, though these students were *less* likely to be motivated by the practical nature of the course. They were less likely to agree school was useful to a current or previous job or that it helped them gain specific job-related skills. However, they were the most likely to agree their senior school studies helped them gain understanding and tolerance of people from different cultures. They were more likely than not to have done a work placement.

This group was the most likely to receive a school VET certificate, particularly Certificate I.

A similar percentage to the sample as a whole (school VET and school non-VET) went on to further education and training, these studies being mainly in the human services area.

Provision of an alternative to the mainstream curriculum

This was given as the purpose by only two of the six clusters (Victoria and Queensland) representing only 18% of the school VET students. Course areas were limited in range mainly to human services and technology and trades.

This was the most focussed group as far as life and career directions were concerned. A high 96% of these students went on to further education and training, having the highest percentage going on to a post-school VET course, mainly at TAFE and in the form of an apprenticeship or traineeship. They were most likely to have found school useful for post-school study, that their further study was related to their school VET course, and to have gained recognition for their school VET course towards further education and training.

This group was the least likely to have done a work placement.

This group received the highest percentage of State Certificates of the three groups, a high percentage of school VET certificates, particularly Certificate II, but the fewest Statements of Attainment and Certificate I. Over half of this group received an other unknown certificate.

Post-school education and training by those who placed a low value on senior school experience

The profile section of all respondents described responses to a question about the perceived value of senior school experience (in terms of whether school was just filling in time; useful personally, for later study, or to a job; and enjoyable) (see figure 5). From responses to this question, 43 students (16% of the 257 answering the question) were categorised as 'low valuers' (see Methodology).

Most of these low valuers were males (60.5%) and had participated in a school VET course (62.8%) (see table 26). Low valuer school VET participants tended to differ from other school VET participants in terms of post-school education and training, but not in terms of employment outcomes. In particular, they were less likely to have gone on to post-school education and training. However, they were much more likely than school non-VET low valuers to have gone on to post-school study, particularly TAFE and full-time study (28% more likely to go to TAFE, 47% more likely to go to full-time study). While not directly comparable, these findings are similar to those of Polesel, Teese and O'Brien (1999a) who found that school VET low achievers were more likely to progress to further study, particularly TAFE study, than school non-VET low achievers. This suggests these rural school VET programs are providing a pathway to post-school work and training for those at risk of dropping out.

Table 26: Relationship between attitude to senior studies, gender and percentage of respondents continuing to post-school education and training

School VET participation	Attitude to senior school studies	Gender			
		Male		Female	
		No.	*% of school VET or school non-VET males*	*No.*	*% of school VET or school non-VET females*
School VET	Poorly valued	17	24.3	10	17.2
	Neutral	45	64.3	35	60.3
	Highly valued	8	11.4	13	22.4
School non-VET	Poorly valued	9	17.6	7	9
	Neutral	33	64.7	46	59
	Highly valued	9	17.6	25	32.1

Outcomes of participation in school VET programs: Employment

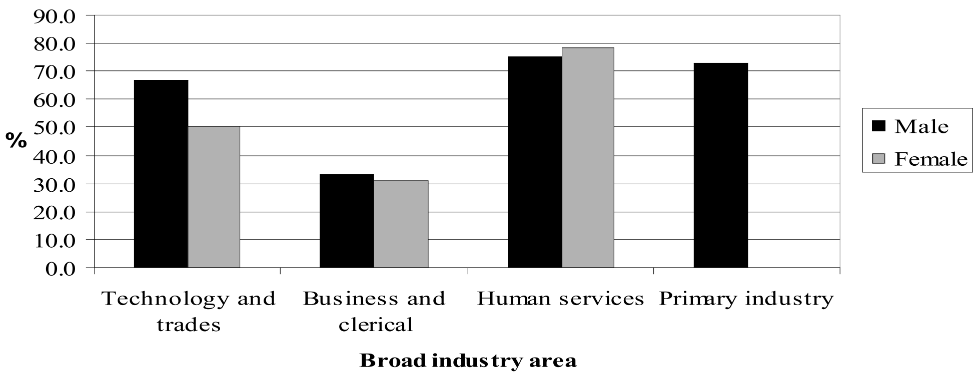
This section follows on from the broad summary of employment outcomes provided earlier for all responding students, both school VET and school non-VET, principally focussing on outcomes for school VET students. It also looks at the relationship between school VET work placements and employment outcomes, following on from the broad outline of work placement findings provided earlier.

School VET course area and employment

Doing an industry-specific school VET course (that is, in those areas other than work skills) appeared to provide some advantage in terms of having a current job to female respondents but not to males. Of the female respondents whose school VET course was in an industry-specific area, 88.2% are currently employed compared with 66.7% of those who did work skills. However, when comparing industry areas, no particular industry area was more likely to provide a job than any other industry area, for either female or male respondents, nor did the students' school VET course area have a significant relationship with the status of current employment (see table A28).

School VET course area was strongly related to the area of the current job, with 62% of those who did VET at school and had a current job, working in the same area as their school VET course (see figure 24). This finding is supported by student responses to a question asking whether they had ever had a job related to the VET course they did at school, with 61.2% answering in the affirmative. Overall, the strongest relationship between school VET area and area of current employment was human services, for males this was followed by technology and trades and primary industry. These findings are supported by those of Misko (2001) and ECEF (2002) who found links between some school VET areas and areas of later employment. Area of current job differed by cluster in accordance with cluster school VET courses.

Figure 24: Percentage of school VET industry area participants with jobs who were currently employed in same industry area



Note: Technology and trades n=14 (male), n=1 (females); Business and clerical n=1 (male), n=4 (females); Human services n=9 (male), n=11 (females); Primary industry n=8 (male), n=0 (of 1 female who did school VET Primary industry).

Work placements and employment outcomes

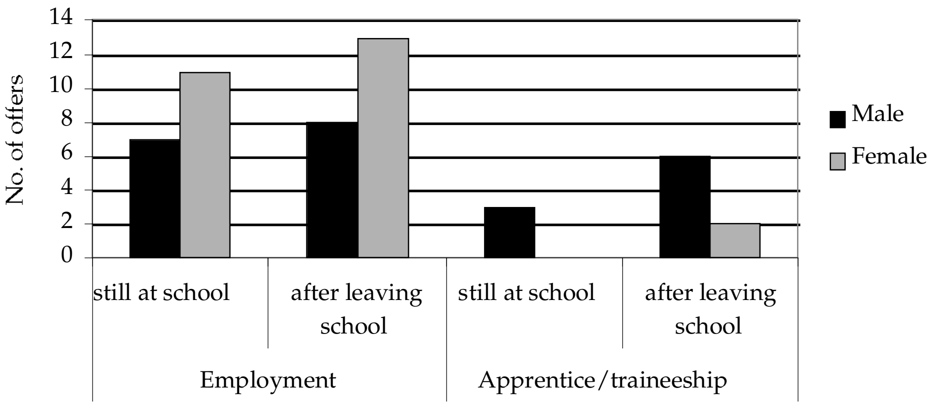
As outlined earlier, over half of respondents who had done a school VET course indicated they had done a work placement (see table A23).

Work placement students were no more likely to have a current job or apprenticeship/ traineeship than other school VET students. This finding contrasts with those of Misko (2001) and ECEF (2002) who found superior employment rates for students who had participated in structured workplace learning. Work placement students in our study were no more or less likely to go on to further education and training than other school VET participants.

There were few significant differences in employment and apprenticeship outcomes from work placements when compared by cluster.

Work placement students were more likely (66%) to have obtained a job related to their area of school VET study than non-work placement students (39%) (see table A26). ECEF (2002) found 45% of work placement students currently employed in the same industry sector. This relationship may be partly explained by the fact that many work placement students gain employment from their work placement employer. About half of work placement students were offered either employment or an apprenticeship or traineeship from their work placement employers in our study (see table A24), while Misko (2001) reported approximately one-third of students who gained employment in the same industry as their SWL program, returned to work for their SWL employer. Over a quarter (28%) of work placement students in our study received an offer of employment or an apprenticeship/traineeship from their work placement employers while still at school, and a further 20% were offered employment or an apprenticeship/ traineeship by their work placement employers after leaving school (see table A24). Females were more likely to receive offers of employment and males were more likely to receive offers of an apprenticeship/traineeship (see figure 25).

Figure 25: Offers of employment and apprenticeship/traineeships to work placement students by gender



Note: χ^2 p value 0.05* male/female offers of employment; χ^2 p value < 0.001* male/female offers of apprenticeship/traineeship

Offers of employment may also partially explain why work placement students were less likely to have completed Year 12 than other school VET students (see table A26 and table A27). A third of those made an offer while still at school left prior to completing Year 12 compared to 17% of those work placement students not made an offer, and 15% of school VET students overall. All three work placement students who were offered an apprenticeship/traineeship while at school left during Year 12.

Teese, Davies and Ryan (1997) reported a link between student profile and the outcomes gained from work placements. In our study, those students who benefited most from work placements in terms of current employment were those whose motivation to do the school VET course was career related. These students were also most likely to be offered an apprenticeship/traineeship from their work placement employer (offers of employment were more evenly distributed across a range of motivations). However, despite the high proportion of work placement students obtaining a job related to their area of school VET study, they were less likely to have placed a high value on their senior school experience than those school VET students not doing a work placement (see table A26).

The industry area of the school VET course bore no relationship to being offered employment or an apprenticeship/traineeship from a work placement. Nor was the work placement industry area related to whether the current employment was full-time or otherwise. This finding differs from those of Misko (2001) and ECEF (2002) who found that students who had completed school VET work placements in areas such as automotive, building and construction, engineering and science, and primary industries were more likely to be in full-time work; however, these results were for respondents only about three to four months out of school.

Work placement students were more likely than other school VET students to have had a casual job while at school (see table A26). Having a job while at school may have been of assistance to work placement students in gaining employment or an apprenticeship/traineeship. Of the 27 students who gained employment as a result of a work placement 21 also had a job while at school. Furthermore, in terms of the likelihood of being employed at the time of the survey ('current employment'), a casual job while at school provided a distinct advantage to female work placement students (96% (23 of 24) female work placement students who did a casual job while at school indicated current employment compared to 57% (8 of 14) female work placement students who did not have a casual job at school). Interestingly, a casual job at school provided little advantage to school VET non-work placement students (male or female) or school non-VET students.

Employment outcomes for students who did not go on to post-school education and training

A quarter of the 132 school VET participants did not go on to any post-school education or training. All but one of these students was currently employed. School VET students with a current job in the area of primary industry were significantly less likely to go on to post-school education and training, followed by those with a job in human services (see table A29). There was no significant difference in the incidence of post-school education and training by current job industry area for school non-VET students. The majority of school VET and school non-VET respondents who did no post-school study and who were employed in primary industry were employed full-time.

The effectiveness of aspects of school VET courses including motivation and purpose in preparing students for employment

School VET student motivation and post-school employment outcomes

The previous section showed there were strong relationships between respondent motivations for doing a school VET course and post-school education and training outcomes. However, there appear to be fewer relationships with employment outcomes with only a few of the motivation categories (career related, practical nature of the course, and limited subject choice) showing significant difference when compared with school VET respondents not in that category.

Following the post-school education and training success of respondents whose motivation was career related described earlier, these respondents were also significantly more likely to be currently employed and have a job related to their school VET course than other school VET respondents. They were also more likely to work in a rural area but not a remote area.

Those whose motivation included the practical nature of the course were described in the previous section as being more likely to go on to do an apprenticeship/traineeship related to their school VET course than other school VET respondents. In terms of employment outcomes they were thus, not surprisingly, more likely to indicate they had had a job related to their school VET course. However, this group was polarised on the question of whether their senior school experience had been useful to a current or previous job with 91% of those agreeing school had been useful being those who had had a job related to their school VET course, and 80% of those disagreeing not having done an apprenticeship/traineeship.

Respondents who indicated they were motivated by limited subject choice were again somewhat negative in their perceptions and outcomes. They were less likely to agree that their senior school experience was useful to a current or previous job, and were less likely to have a full-time job and more likely to have a casual job than other school VET respondents. These results may, however, be related to the finding described earlier that this group was more likely to have gone on to full-time university study than other school VET respondents. They were more likely to work in a remote area than other school VET respondents.

Purpose of school VET program and employment outcomes

In general, the purpose of the school VET program had little influence on students' employment outcomes in terms of rate or status of current employment, or whether the industry area of post-school employment was related to the area of their school VET course. However, purpose of the school VET course did appear to be associated with a few other aspects of employment and, particularly, work placements, as described below.

Pathway to local employment

Of all the purposes, this program was the most likely to be associated with full-time current employment.

Students in these school VET programs were more likely to have been involved in a work placement than those whose school VET program did not have this purpose. They were also more likely to have had an offer of employment or apprenticeship/traineeship either while still at school or after having left school. This is despite being less likely to have a job while at school. Following their success in gaining employment from their work placement, this group was more likely to agree that they had since had a job or an apprenticeship/traineeship related to their school VET course.

Their current job was more likely to be in the area of primary industry and business and clerical and less likely to be in human services than students in other school VET purpose areas. This group was the most likely to work in a remote area.

Provision of general workplace skills and knowledge

Like the group above, students in this school VET program were more likely to have been involved in a work placement than those whose school VET program did not have this purpose. They were also more likely to have had a casual job while at school. However, unlike the pathway to local employment group above, they were less likely to have received an offer of employment or apprenticeship/traineeship from their work placement employer, either while still at school or after having left school. This is despite the finding reported earlier that those work placement students having a casual job at school were much more likely to be offered a job from their work placement employer. Consequently, this group were less likely to agree that senior secondary school was useful to their current or previous job.

Their current job was more likely to be in the area of human services and less likely to be in primary industry than students of other school VET programs. They were also more likely to have a job in a rural area.

Provision of an alternative to the mainstream curriculum

There were few findings that approached significance with regards to employment outcomes for this group, partly because of the small numbers involved. They were less likely to have been involved in a work placement and less likely to have had an offer of employment or an apprenticeship/traineeship from their work placement while at school.

Outcomes of school VET programs for rural communities

This chapter follows on from the broad discussion earlier of the extent to which youth participation or non-participation in school VET programs influences youth retention in rural communities. It looks specifically at how particular features of school VET programs and other factors, such as involvement in community activities and employment during and after school, are related to rural retention of youth in both the short and the longer term.

The profile section noted that 76% of all respondents (school VET and school non-VET) intended to live in a rural or remote area during their working life. Around half the respondents intended to stay in or return to the community where they went to school. School VET students were more likely than school non-VET students to intend to live in a rural location generally (80% compared with 71%) and to intend to live in their 'home' community (55% compared with 42%).

Between 69% (South Australia) and 85% (Tasmania and New South Wales) of school VET respondents from each cluster intend to live in a rural area during their working life. Between 39% (New South Wales) and 61% (Tasmania) of the respondents intend to live in their home community.

Intentions to live in a rural area and post-school education and training outcomes

Eighty-four per cent of all respondents (school VET and school non-VET) who intend to live in a rural area during their working life had commenced some form of post-school education or training. This is a similar proportion to those who do not intend to live in a rural area or are uncertain. School VET students who intend to live in a rural area were less likely to have commenced post-school education or training than school non-VET students who intend to live in a rural area (table 27). School VET students who intend to live in a rural area are more likely than their school non-VET counterparts, however, to have gone on to further vocational education and training after leaving school (table 28). This result applies to both genders and consistent with the finding that school VET participants as a whole are more likely than other students to have undertaken further vocational education and training.

Table 27: Intention to live in a rural area and live in home community by any post-school education and training

Intend to live rurally	Post-school education and training					
	Yes		No		Total	
	No.	*%*	*No.*	*%*	*No.*	*%*
School VET participants	81	76.4	25	23.6	**106**	**100**
School non-VET participants	91	92.9	7	7.1	**98**	**100**
Total	**172**	**84.3**	**32**	**15.7**	**204**	**100**

Note: χ^2 p 0.001* school VET/school non-VET

Intend to live in home community	Post-school education and training					
	Yes		No		Total	
	No.	*%*	*No.*	*%*	*No.*	*%*
School VET participants	53	73.6	19	26.4	**72**	**100**
School non-VET participants	56	91.8	5	8.2	**61**	**100**
Total	**109**	**82.0**	**24**	**18.0**	**133**	**100**

Note: χ^2 p 0.007* school VET/school non-VET

Table 28: Intention to live in a rural area and live in home community by post-school VET

Intend to live rurally	Post-school VET					
	Yes		No		Total	
	No.	*%*	*No.*	*%*	*No.*	*%*
School VET participants	65	61.3	41	38.7	**106**	**100**
School non-VET participants	47	48.0	51	52.0	**98**	**100**
Total	**112**	**54.9**	**92**	**45.1**	**204**	**100**

Note: χ^2 p 0.055* school VET/school non-VET

Intend to live in home community	Post-school VET					
	Yes		No		Total	
	No.	*%*	*No.*	*%*	*No.*	*%*
School VET participants	41	56.9	31	43.1	**72**	**100**
School non-VET participants	33	54.1	28	45.9	**61**	**100**
Total	**74**	**55.6**	**59**	**44.4**	**133**	**100**

Note: χ^2 p 0.742 school VET/school non-VET

What relationship is there between the school VET course studied and rural retention of youth?

Features of school VET programs and rural community outcomes

Purpose of school VET program and rural community outcomes

Pathway to local employment

School VET respondents who had attended a school with pathway to local employment as its main purpose were the most likely to live and work in a remote area.

Provision of general workplace skills and knowledge

A higher percentage of respondents who were in a school VET program with this purpose indicated they had not moved from their school locality and currently reside in a rural area (as opposed to a metropolitan or remote area) than those respondents whose school VET program did not have this purpose. They were, consequently, also more likely to have a job in a rural area. Interestingly, they were less likely to be currently involved in the community or have been involved with the community while at school than those whose school VET program did not have this purpose.

Provision of an alternative to the mainstream curriculum

There were few findings that approached significance for this group with regards to rural community outcomes, partly because of the small numbers involved. They were somewhat more likely to have been involved in the community while at school and slightly more likely to be currently involved in the community.

School VET industry area and rural community outcomes

Respondents who intend to live in a rural area during their working life are more likely to have studied a school VET course in technology and trades, primary industry or work skills than business and clerical or human services (table 29). Over half the school VET students who do not intend to return to their home community or are uncertain studied business and clerical or human services (table 30). This result is consistent with a desire to obtain skills that open up jobs in metropolitan areas and growth regions in industries such as retail, tourism and hospitality. These industries provide casual and part-time work that is attractive to students, as well as careers. Students from all clusters are represented in the group that studied school VET business and clerical or human services courses at school and does not intend to return.

Table 29: Intention to live in a rural area compared with school VET area of study

School VET study area	Intend to live rurally		Not intend to live rurally or uncertain		Total	
	No.	*%*	*No.*	*%*	*No.*	*%*
Technology and trades	23	95.8	1	4.2	**24**	**100**
Business and clerical	12	70.6	5	29.4	**17**	**100**
Human services	21	72.4	8	27.6	**29**	**100**
Primary industry	10	83.3	2	16.7	**12**	**100**
Work skills	18	85.7	3	14.3	**21**	**100**
Total	**84**	**81.6**	**19**	**18.4**	**103**	**100**

Note: χ^2 $p < 0.001$ (business and clerical + human services)/ (technology and trades + primary industry + work skills).

Table 30: Intention to live in home community compared with school VET area of study

School VET study area	Live in home community		Not intend to return or uncertain		Total	
	No.	*%*	*No.*	*%*	*No.*	*%*
Technology and trades	15	62.5	9	37.5	**24**	**100**
Business and clerical	8	47.1	9	52.9	**17**	**100**
Human services	13	44.8	16	55.2	**29**	**100**
Primary industry	7	58.3	5	41.7	**12**	**100**
Work skills	14	66.7	7	33.3	**21**	**100**
Total	**57**	**55.3**	**46**	**44.7**	**103**	**100**

Note: χ^2 $p < 0.001$ (business and clerical + human services)/ (technology and trades + primary industry + work skills).

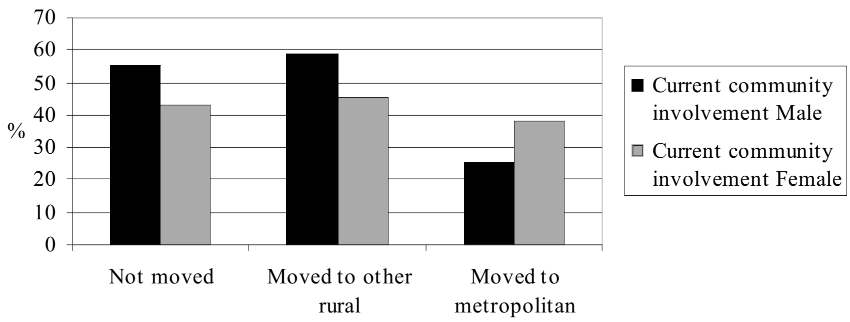
What relationship is there between community involvement, school VET participation and retention of youth in rural communities?

In Kilpatrick et al. (2002) a number of community members commented that retention of rural youth in the community has a profound effect on the survival of community groups, particularly sporting groups. The current study has investigated the relationship between community involvement (during school years and currently) and the decision of rural youth to remain in rural communities.

From the findings there appears to be no significant relationship between respondents' community involvement at school and whether or not they remained in, or returned to live in, rural communities. As noted in an earlier section, a significantly higher percentage of school non-VET students were involved in community activities while at school than school VET students. Further, school VET respondents who participated in a work placement were no more or less likely to be involved in community activities while at school or to intend to stay in or return to their community, or live in another rural or regional area.

As outlined earlier in the profile section, few students agreed that their school VET course made them feel closer to and more involved in their community. There was also no significant relationship between current community involvement and current place of residence; however, those students who moved to metropolitan areas were less likely to have any current community involvement than those who were living in rural or remote areas. The loss of community connectedness associated with this move is similar for school VET and school non-VET students but particularly significant for school VET males (see figure 26).

Figure 26: Current community involvement by gender and locality



Note: χ^2 p = 0.039* males moved; 0.865 females moved.

There was no statistically significant relationship between current involvement in community activities and school VET participation, apprenticeships and employment.

A minority of school VET students, both male (13%) and female (24%), agreed with the statement that participation in school VET courses made them feel closer to, and more involved in, their community. Female work placement students were, however, more likely to agree that participation in school VET courses made them feel closer to, and more involved in, their community than female or male school VET students who had not done a work placement. However, these perceptions of school VET respondents (work placement and non-work placement) had no discernable effect on their intentions of remaining in or returning to that community.

Males (both school VET and school non-VET) who are currently involved in the community are more likely to intend staying in their home community than males not involved in the community. In contrast, females who are currently involved in the community are less likely than non-involved females to intend staying in their home community.

What relationship exists between locality of current residence and type of employment?

For school VET participants, jobs in rural and metropolitan areas were mainly full-time, but those in remote areas tended to be casual. Of the school non-VET participants, equal numbers were working in casual and full-time jobs in rural and remote areas and more were working in full-time employment in metropolitan areas (see table 31).

Table 31: **Comparison of job status and location by school VET participation**

Rurality of current job	School VET participation	Job status										
		Casual		Part time		Full time		Self-employed		Voluntary		Total
		no.	*%*	*no.*	*%*	*no.*	*%*	*no.*	*%*	*no.*	*%*	*no.*
Metropolitan	VET	6	25.0	2	8.3	16	66.7	0	0.0	0	0.0	**24**
	non-VET	14	40.0	5	14.3	15	42.9	0	0.0	1	2.9	**35**
Rural	VET	23	26.7	8	9.3	51	59.3	1	1.2	3	3.5	**86**
	non-VET	35	43.8	7	8.8	35	43.8	2	2.5	1	1.3	**80**
Remote	VET	6	66.7	0	0.0	2	22.2	1	11.1	0	0.0	**9**
	non-VET	3	50.0	0	0.0	3	50.0	0	0.0	0	0.0	6

Main industries of current employment for rural, remote and metropolitan localities were similar for school VET and school non-VET participants. In rural areas, these were human services and primary industry. In remote areas they were primary industry and human services, while in metropolitan areas, human services and technology and trades were the main employing industries (see table 32).

Table 32: **Comparison of area of employment and location by school VET participation**

Rurality of current job	School VET participation	Area of employment										
		Technology and trades		Business and clerical		Human services		Primary industry		Other		Total
		n	*%*	*n*	*%*	*n*	*%*	*n*	*%*	*n*	*%*	*n*
Metropolitan	VET	7	29.2	2	8.3	10	41.7	3	12.5	2	8.3	**24**
	non-VET	8	22.9	2	5.7	23	65.7	2	5.7	0	0.0	**35**
Rural	VET	21	24.4	11	12.8	32	37.2	22	25.6	0	0.0	**86**
	non-VET	15	18.8	12	15.0	32	40.0	17	21.3	4	5.0	**80**
Remote	VET	36	11.1	23	0.0	64	22.2	39	66.7	4	0.0	**9**
	non-VET	0	0.0	0	0.0	1	16.7	4	66.7	1	16.7	**6**

Conclusions and implications

Before attempting to draw some conclusions and implications from the study, it is first necessary to highlight the key findings from the Results and discussion chapter.

Key findings

The key findings relate to the *features* of rural school VET programs that contribute to successful outcomes, and to the *outcomes* themselves in terms of education and training, employment and rural youth retention/community development for both rural school VET and non-VET students.

Features of school VET

Purpose of school VET program

As outlined earlier, there were three main purposes for school VET programs across the different clusters: pathway to local employment, provision of general workplace skills and knowledge, and as an alternative to the mainstream curriculum.

School VET students in a cluster with the purpose *pathway to local employment* had the most distinctive outcomes and were more likely to report that their school VET course:

- had influenced their decision to continue with senior secondary school
- helped improve their literacy and numeracy skills, and
- led to a job related to their school VET course.

Those undertaking school VET programs with this purpose and who participated in a work placement were also more likely to have received an offer of a job or an apprenticeship/ traineeship through their work placement, and to have stayed in their home community.

All three clusters in the case studies provided in appendix C included pathway to local employment as their school VET purpose. The South Australian and Tasmanian clusters in particular demonstrate the value of these programs in association with work placements.

Work placements

Over half of all school VET respondents in this study participated in a work placement (also called structured workplace learning). The case studies, particularly the Tasmanian and South Australian clusters, give examples of how work placements are linked to post-school employment and education and training choices of students.

- Completion of a work placement appeared to be a pathway to initial employment on leaving school:
  - half the work placement students were offered employment by their employer;
  - females were more likely to receive offers of employment from their work placement and males were more likely to receive offers of an apprenticeship/traineeship.

- Work placement students were less likely to have completed Year 12 than other school VET students. About a third of work placement students who were offered a job or apprenticeship/ traineeship while still at school appear to have accepted the offer and left school early.
- Despite half of the work placement students receiving a job offer from their employer, at the time of the survey two to three years after leaving school, work placement students were no more likely to be currently employed full-time or to have commenced an apprenticeship or traineeship than other school VET students.
- Work placement students were more likely than other school VET students to have obtained employment in the same industry area as their school VET study.
- A higher proportion of work skills students (85%) did a work placement than in any other school VET industry area. This is probably because work skills student are not tied to any one industry and so have a greater pool of potential employers from which a placement can be sourced in rural areas.

School VET student motivation

Respondents were asked to indicate what motivated them to do a school VET course. Those who indicated they did school VET for career reasons displayed the most distinctive outcomes.

Those students who chose their school VET subjects for career reasons were:

- more likely to do a work placement and for this to have resulted in an offer of an apprenticeship or traineeship
- less likely to finish Year 12
- more likely to go on to post-school education and training than other school VET students.

The Tasmanian and South Australian case studies in appendix C include examples of the post-school experiences of students who chose school VET for career reasons.

Gender

There were clear gender differences in the choice of school VET courses. Females were more likely to choose business and clerical and work skills courses. Males were more likely to choose technology and trades, and primary industry courses.

Education and training outcomes

- 85% of respondents had commenced post-school education or training including through a traineeship or apprenticeship.
- School VET and school non-VET participants gave similar responses to most of the questions about the value of senior school in helping them develop generic and job-specific skills.
- More school VET than school non-VET participants agreed that school helped them in developing specific, job-related skills, developing new ideas and in using IT and new forms of technology. Female school VET students in particular reported benefits from learning to use IT and new forms of technology.
- School VET students were less likely to continue with post-school education and training in general, but more likely to go onto further *vocational* education and training than school non-VET students. All three case studies in appendix C highlight these post-school VET pathways.
- School VET females' post-school education and training participation pattern was more similar to that of males (VET and non-VET) than to that of female non-VET respondents.
- Over one-third of all respondents had commenced an apprenticeship or traineeship since leaving school. Regardless of whether they did school VET or not, far more males than females went onto apprenticeships. There was also a gender difference in choice of apprenticeship and traineeship fields, with males principally choosing the area of technology and trades, followed by

primary industry and human services, while females mainly chose business and clerical and human services. These points are illustrated in the case studies.

- ✧ School VET students were no more likely to enter apprenticeships/traineeships after leaving school than school non-VET students (see in particular the South Australian case study).
- ✧ Over half of the post-school education and training courses undertaken were in the same broad industry area as the school VET course; examples are included in the case studies in appendix C. Seventy per cent of apprenticeships and traineeships undertaken were in the same broad industry area as the school VET course. For those students who did a school VET course in technology and trades and human services, there is a strong link with post-school education and training in the same area. For technology and trades this link is especially through males going onto apprenticeships and traineeships.
- ✧ Business and clerical school VET students were the most likely, and primary industry the least likely, to continue with any post-school education and training. The weak linkage between primary industries and post-school education and training is highlighted in the Western Australian case study.
- ✧ Of respondents who indicated their further education and training was related to their school VET course, one-third had received advanced standing or credit for the school VET course (such as time taken off their apprenticeship – see the South Australian case study). Those most likely to receive credit had undertaken school VET study in human services (mainly tourism and hospitality); those least likely to gain credit had studied in the business and clerical, and work skills, areas.

Employment outcomes

The case studies in appendix C provide illustrations of post-school employment experiences.

- ✧ 89% of all respondents were employed at the time of the survey. School VET students in general are no more likely to be currently employed than school non-VET students. All 31 early school leavers were employed.
- ✧ Male respondents were more likely to be involved in full-time employment than female respondents, in line with national labour force figures for this age group, and school VET students were more likely to be involved in full-time employment than school non-VET students.
- ✧ Most jobs in the technology and trades area were full-time and taken by males whereas the human services area was dominated by females in casual jobs. The gendered nature of employment outcomes is particularly apparent in the Western Australian case study.
- ✧ Of those school VET students currently working, 62% indicated that their job was in the same broad industry area as their school VET course. The industry area with the strongest link was human services, and with the weakest link, business and clerical.
- ✧ Females who did an industry specific school VET course, as opposed to a work skills course, were more likely to be currently employed.

Community outcomes

- ✧ At the time of the survey, two to three years after they had left secondary school, 80% of respondents normally resided in a rural area and 20% in a metropolitan area. Care has to be taken in interpreting these findings because questionnaires were mailed to the last-known address of students as per 1998 school records, so there was some bias towards those who remained in the locality where they had attended school. Rural retention of youth through pathways to local employment are highlighted in all three of the case studies.
- ✧ Most students surveyed indicated their intention to live in a rural community at some stage in their working life, with school VET students more likely to intend to live in their home community, and in a rural area more generally:

- ♦ Female school VET students were the most likely, and female school non-VET students the least likely, to intend to remain in their school locality.
- ♦ A comparison of current postcode against school postcode showed that male school VET students were the most likely to move after leaving school, closely followed by female school non-VET students who were the most likely to move to metropolitan areas for university study.
- ♦ School VET males were the most likely to reside in a remote area.

✧ School VET respondents who intend to live in a rural area during their working life are more likely to have studied a school VET course in technology and trades, primary industry or work skills than business and clerical or human services.

✧ Female students were no more likely to have a current job in a rural area than male students. Likewise, school VET students were no more likely to have a current job in a rural area than school non-VET students.

✧ A significantly higher percentage of school non-VET students were involved in community activities while at school than school VET students.

✧ There appeared to be no relationship between community involvement at school and whether or not respondents remained in, or returned to live in, rural communities.

✧ Those students who moved to metropolitan areas were less likely to have any current community involvement than those who were living in rural or remote areas. The loss of community connectedness associated with this move is similar for school VET and non-VET students but particularly significant for school VET males.

✧ School VET students who intend to live in a rural area were less likely to continue with post-school education and training in general, but more likely to go onto further vocational education and training than school non-VET students who intend to live in a rural area.

Conclusions

The key findings highlighted in the previous section indicate that the features of rural school VET programs that appear to influence post-school education and training, employment and community outcomes include the purpose of the school VET program, work placements, and course industry area. Student motivation and gender influence outcomes for individual students.

School VET courses intended as a pathway to local employment appeared to be successful in terms of retaining students who otherwise may have left school early and in assisting the transition from school to work. Work placements are a key component of the success of these programs in terms of both a transition pathway to local jobs and apprenticeships, and in increasing youth retention in the community. These findings are illustrated in the case studies.

Many students are motivated to do school VET for career reasons, and it appears they undertake school VET and work placements as a pathway to their goal of local employment. Their choice of school VET industry area is generally closely aligned to their employment goals, as are their post-school education and training choices. In this context, the fact that a proportion of these students leave school before completing Year 12 to take up job or apprenticeship offers should not be seen as a failure of school VET. Other researchers have focussed on these students (Smith 1996; Searston 1996) which Dwyer (1996) has termed ‘opportune leavers’, raising the need to consider new and expanded definitions of ‘successful’ school VET outcomes.

Gender and choice of school VET industry area are strongly related and appear to be related to post-school outcomes. Male school VET students predominantly choose the technology and trades areas that are associated with full-time employment and apprenticeships, whereas females tend to choose human services, business and clerical, and work skills programs that are associated with casual or part-time jobs. These are challenging issues for schools and communities, as both traditional gender occupational choices and industry occupational arrangements (such as the part-time and casual nature of hospitality jobs) play a key part in these outcomes.

In terms of further education and training and employment outcomes, the findings suggest that many of the outcomes of participation in school VET for rural students are similar to the outcomes for school VET students identified in other research studies. For example, school VET students were more likely to go onto post-school VET study (Lamb, Long & Malley 1998; Ball & Lamb 1999–2000; Fullarton 2001), and there was a clear link between area of school VET study and further education and training (Misko 2001; ECEF 2002). The link was particularly strong for those who undertook apprenticeships and traineeships. A comparison with other research studies (Fullarton 2001; Misko 2001; ECEF 2002) indicates similarities in terms of employment outcomes, specifically the links between participation in a school VET course and full-time employment. The current study also supports research that links work placements with positive employment outcomes (Misko 2001; ECEF 2002), although this advantage appears to relate only to initial employment on leaving school. The three case studies at the end of this report illustrate the diversity of pathways for rural students, and the role of school VET courses in strengthening the transition from school to post-school life.

When the findings for school VET students from the current study are compared with the findings from short-term destination surveys (see, for example, Polesel, Teese & O'Brien 1999a), our survey shows an increase in employment and further education and training rates for students some three years out of school. This suggests that immediate post-school destination studies present a limited picture of the post-school experiences re education and training, and employment. Another interesting difference between our study and other school VET studies (Ball & Lamb 1999–2000; Fullarton 2001) was in the area of post-school apprenticeships and traineeships, where there was very little difference in the participation rate between school VET and school non-VET students. This suggests that apprenticeships in rural communities may still be accessed largely through family connections and networks, rather than as a result of school VET study.

Interestingly, there was less evidence of an association between school VET participation and the engagement and retention of rural youth in their communities than the researchers had expected. However, school VET students were more likely than non-VET students to indicate their intention to live in a rural location during their working life. When considered alongside other findings that rural students are more likely to choose VET than urban students (for example, Fullarton 2001), this suggests that school VET programs have special potential to develop skills for the future workforce of rural Australia. Further, there are some indications that school VET in rural areas does make a positive difference in terms of employment for early leavers, and in terms of retention in the community for female school VET students.

The findings suggest that rural school VET courses are pathways to related education and training (and presumably careers, particularly in technology and trades areas) both for students who intend to live in a rural area during their working life and for those who do not intend to join the workforce in rural Australia. For example, school VET appears to be used by some students to gain skills for casual and part-time jobs that will help finance their studies in metropolitan areas. These students are more likely to have studied a school VET course in the business and clerical or human services areas than other areas. Thus, school VET programs have a role to play both in providing education, training, and skills for the rural workforce and in assisting those students who wish to undertake further study in metropolitan areas. This suggests there is an opportunity for VET programs in rural schools to assist in the transition from school to further education and training and careers for a wide range of rural students.

Implications

A number of implications arise from this study, particularly in relation to the need for further research into the post-school pathways of rural students. As this was a pilot study of the post-school education and training and work experiences of students from small rural schools, further research with a larger sample is needed to test a number of the findings. These include the link between

VET in rural schools and post-school apprenticeships and traineeships, and the effectiveness of school VET programs in meeting local skill needs. Such studies should ensure that data are captured for those not represented adequately in our survey; for example, for those who leave a school VET program before the end of Year 12 in order to continue the VET pathway in the workforce.

In addition, more longitudinal studies of post-school outcomes are needed (approximately five years after leaving school) for all rural students (school VET and non-school VET). These studies will need to use different methodologies, as questionnaires tend to favour those with higher literacy levels.

More research into community outcomes of school VET programs is required, especially in rural areas. Community outcomes include outcomes for industry and rural businesses as well as social outcomes, for example, building social capital and retention of young people. In particular, further research is required into 'pathways' and 'mosaics' of post-school work, study and geographic mobility using techniques such as the chronological matrix of post-school activities suggested in the full report (table 8).

Not withstanding the need for further, larger scale research, the current study captures important baseline data on rural post-school pathways. It is therefore recommended that this group be followed at regular intervals to capture post-school 'mosaics' and actual impacts on the rural workforce and rural communities. The fact that a number of respondents indicated they were prepared to participate in a follow-up study would facilitate such research.

Further research is also required into how to develop successful school-local industry/community partnerships in rural areas, in light of the positive outcomes reported from school VET programs whose purpose was to provide a pathway to local employment.

In addition to the implications for research, there are implications for VET systems. Findings from the study suggest that pathways from primary industries school VET courses must be more flexible to improve access to further training in this area, particularly for those who work in primary industries in remote areas.

Finally, females need to be encouraged to consider areas of school VET study that lead to career paths in rural areas (e.g. trades and technology). Schools and communities have an obligation to ensure alternative career-oriented options are available for female students.

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Appendix A: Additional tables

Table A1: Rurality of current residence compared with school VET participation and gender

	Metropolitan		Rural		Remote		Total
	No.	%	No.	%	No.	%	No.
Male school VET	13	17.8	47	64.4	13	17.8	**73**
Male school non-VET	9	17.3	42	80.8	1	1.9	**52**
Female school VET	6	10.2	47	79.7	6	10.2	**59**
Female school non-VET	25	29.1	54	62.8	7	8.1	**86**
Total	**53**	**19.6**	**190**	**70.4**	**27**	**10.0**	**270**

Note: χ^2 p values 0.018* male school VET/school non-VET; 0.024* female school VET/ school non-VET.

Table A2: Residential rurality by school cluster

School cluster	Metropolitan area		Rural area		Remote area		Total	
	No.	%	No.	%	No.	%	No.	%
NSW	0	0	28	82.4	6	17.6	**34**	**100**
Victoria	0	0	30	85.7	5	14.3	**35**	**100**
Queensland	4	11.4	21	60.0	10	28.6	**35**	**100**
SA	1	4.0	18	72.0	6	24.0	**25**	**100**
WA	19	24.4	40	51.3	19	24.4	**78**	**100**
Tasmania	3	4.8	53	84.1	7	11.1	**63**	**100**
Total	**27**	**10**	**190**	**70.4**	**53**	**19.6**	**270**	**100**

Table A3: Rurality of current employment by school cluster

School cluster	Metropolitan area		Rural area		Remote area		Total	
	No.	%	No.	%	No.	%	No.	%
NSW	8	25.8	23	74.2	0	0	**31**	**100**
Victoria	10	31.3	22	68.8	0	0	**32**	**100**
Queensland	9	30.0	19	63.3	2	6.7	**30**	**100**
SA	5	21.7	12	52.2	6	26.1	**23**	**100**
WA	20	28.2	46	64.8	5	7.0	**71**	**100**
Tasmania	7	13.2	44	83.0	2	3.8	**53**	**100**
Total	**59**	**24.6**	**166**	**69.2**	**15**	**6.3**	**240**	**100**

Table A4: Moved from school locality by school cluster

School cluster	Not moved		Moved to other rural area (including remote)		Moved to metropolitan area		Total	
	No.	%	No.	%	No.	%	No.	%
NSW	29	85.3	0	0	5	14.7	**34**	**100**
Victoria	25	71.4	5	14.3	5	14.3	**35**	**100**
Queensland	24	68.6	4	11.4	7	20.0	**35**	**100**
SA	18	72.0	1	4.0	6	24.0	**25**	**100**
WA	44	56.4	14	17.9	20	25.6	**78**	**100**
Tasmania	47	74.6	9	14.3	7	11.1	**63**	**100**
Total	**187**	**69.3**	**33**	**12.2**	**50**	**18.5**	**270**	**100**

Table A5: Moved location of residence compared with school VET participation and gender

School VET participation	Not moved		Moved to other rural		Moved to metropolitan		Total
	No.	%	No.	%	No.	%	No.
Male school VET	44	60.3	16	21.9	13	17.8	**73**
Male school non-VET	39	75.0	6	11.5	7	13.5	**52**
Female school VET	48	81.4	5	8.5	6	10.2	**59**
Female school non-VET	56	65.1	6	7.0	24	27.9	**86**
Total	**187**	**69.5**	**33**	**12.6**	**50**	**18.4**	**270**

Note: χ^2 p values 0.207 male school VET/school non-VET; 0.035* female school VET/school non-VET

Figure A1: Change of residence for respondents (by gender) who attended specific post-school educational institutions

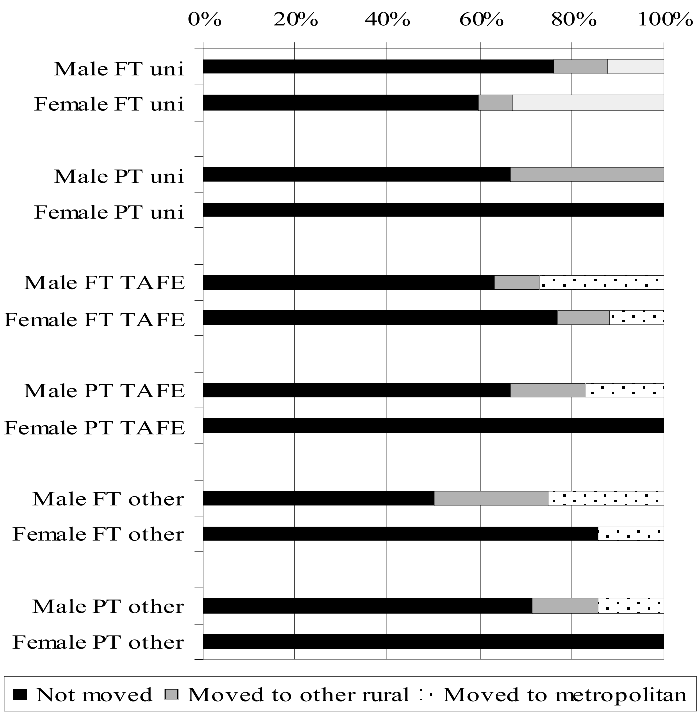

Table A6: Intention to live in a rural community during working life, by gender

Gender	Intend to live rurally		Not intend to live rurally or uncertain		Total	
	No.	%	No.	%	No.	%
Male	96	76.8	29	23.2	**125**	**100**
Female	108	74.5	37	25.5	**145**	**100**
Total	**204**	**75.6**	**66**	**24.4**	**270**	**100**

χ^2 p male/female 0.659

Table A7: Intend to live in home community during working life, by gender

Gender	Live in home community		Not intend to return or uncertain		Total	
	No.	%	No.	%	No.	%
Male	66	52.8	59	47.2	**125**	**100**
Female	67	46.2	78	53.8	**145**	**100**
Total	**133**	**49.3**	**137**	**50.7**	**270**	**100**

χ^2 p male/female 0.280

Table A8: Completion of school, by school VET participation and gender

	During Year 11		At the end of Year 11		During Year 12		At the end of Year 12		During Year 13		At the end of Year 13		Total	
	No.	%	No.	%	No.	%	No.	%	No.	%	No.	%	No.	%
Male school VET	0	0.0	7	9.6	6	8.2	60	82.2	0	0.0	0	0.0	**73**	**27.0**
Male school non-VET	1	1.9	5	9.6	1	1.9	43	82.7	1	1.9	1	1.9	**52**	**19.3**
Female school VET	2	3.4	4	6.8	1	1.7	48	81.4	0	0.0	4	6.8	**59**	**21.9**
Female school non-VET	0	0.0	2	2.3	2	2.3	80	93.0	0	0.0	2	2.3	**86**	**31.9**
Total	**3**	**1.1**	**18**	**6.7**	**10**	**3.7**	**231**	**85.6**	**1**	**0.4**	**7**	**2.6**	**270**	**100.0**

Note: χ^2 p values 0.273 male school VET/school non-VET; 0.625 female school VET/school non-VET

Table A9: Completion of school by current job status and school VET participation and gender

		Current job status											
		No current job		Casual		Part-time		Full-time		Other (self-employed/ voluntary)		Total	
		No.	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*
Early leaver	Male school VET	0	0	1	7.7	0	0	11	84.6	1	7.7	**13**	**100**
	Male school non-VET	0	0	2	28.6	0	0	5	71.4	0	0	**7**	**100**
	Female school VET	0	0	2	28.6	1	14.3	4	57.2	0	0	**7**	**100**
	Female school non-VET	0	0	1	25.0	1	25.0	2	50.0	0	0	**4**	**100**
	Total	**0**	**0**	**6**	**19.4**	**2**	**6.5**	**22**	**71.0**	**1**	**3.2**	**31**	**100**
Completed year 12	Male school VET	4	6.7	14	23.3	1	1.7	38	63.3	3	5.0	**60**	**100**
	Male school non-VET	5	11.1	12	26.7	3	6.7	25	55.6	0	0	**45**	**100**
	Female school VET	9	17.3	18	34.6	8	15.4	16	30.8	1	1.9	**52**	**100**
	Female school non-VET	12	14.6	37	45.1	8	9.8	21	25.6	4	4.9	**82**	**100**
	Total	**30**	**12.6**	**81**	**33.9**	**20**	**8.4**	**100**	**41.8**	**8**	**3.4**	**239**	**100**

Table A10: Reflections on senior school experience (response categories collapsed)

		Agree		Neutral		Disagree		Total
		No.	%	No.	%	No.	%	No.
School filling in time^	Male school VET	12	17.1	16	22.9	42	60.0	**70**
	Male school non-VET	4	7.7	9	17.3	39	75.0	**52**
	Female school VET	4	6.9	9	15.5	45	77.6	**58**
	Female school non-VET	3	3.7	10	12.3	68	84.0	**81**
School useful personally	Male school VET	57	81.4	11	15.7	2	2.9	**70**
	Male school non-VET	45	86.5	5	9.6	2	3.8	**52**
	Female school VET	49	84.5	8	13.8	1	1.7	**58**
	Female school non-VET	69	84.1	12	14.6	1	1.2	**82**
School useful for study#	Male school VET	37	52.9	22	31.4	11	15.7	**70**
	Male school non-VET	36	70.6	6	11.8	9	17.6	**51**
	Female school VET	34	57.6	15	25.4	10	16.9	**59**
	Female school non-VET	65	77.4	14	16.7	5	6.0	**84**
School useful to job	Male school VET	48	65.8	17	23.3	8	11.0	**73**
	Male school non-VET	27	51.9	13	25.0	12	23.1	**52**
	Female school VET	29	50.0	18	31.0	11	19.0	**58**
	Female school non-VET	34	42.5	30	37.5	16	20.0	**80**
School enjoyable	Male school VET	50	71.4	15	21.4	5	7.1	**70**
	Male school non-VET	40	76.9	11	21.2	1	1.9	**52**
	Female school VET	49	83.1	6	10.2	4	6.8	**59**
	Female school non-VET	68	84.0	12	14.8	1	1.2	**81**

Note: ^ 'filling in time' male/female χ^2 p value 0.014*, school VET/school non-VET χ^2 p value 0.043*; 'useful personally' non-sig.; # 'useful for study' school VET/school non-VET p=0.003* statistically significant for both males and females; 'useful for job' male/female p=0.06*, school VET/school non-VET p=0.111; 'enjoyable' school VET/school non-VET p=0.087.

Table A11: The role of school in developing general and job-specific skills for school VET and school non-VET respondents

Year 11/12 helped me to gain skills in	School VET/ non-VET	Strongly agree		Agree		Neutral		Disagree		Strongly disagree		Not sure		Total
		No.	%	No.	%	No.	%	No.	%	No.	%	No.	%	No.
Collecting & analysing information	VET	19	14.5	77	58.8	25	19.1	6	4.6			4	3.1	**131**
	non-VET	15	11.0	84	61.8	35	25.7	2	1.5					**136**
	Total	34	12.7	161	60.3	60	22.5	8	3.0			4	1.5	**267**
Communicating with others	VET	42	31.8	75	56.8	13	9.8	1	0.8	1	0.8			**132**
	non-VET	36	26.3	80	58.4	16	11.7	5	3.6					**137**
	Total	78	29.0	155	57.6	29	10.8	6	2.2	1	0.4			**269**
Planning & organising activities	VET	27	20.5	73	55.3	26	19.7	4	3.0	1	0.8	1	0.8	**132**
	non-VET	27	19.9	72	52.9	30	22.1	6	4.4	1	0.7			**136**
	Total	54	20.1	145	54.1	56	20.9	10	3.7	2	0.7	1	0.4	**268**
Working with others and in teams	VET	39	29.5	72	54.5	16	12.1	4	3	1	0.8			**132**
	non-VET	28	20.6	80	58.8	22	16.2	6	4.4					**136**
	Total	67	25.0	152	56.7	38	14.2	10	3.7	1	0.4			**268**
Solving problems and making decisions	VET	35	26.5	72	54.5	17	12.9	8	6.1					**132**
	non-VET	26	19.0	75	54.7	28	20.4	7	5.1	1	0.7			**137**
	Total	61	22.7	147	54.6	45	16.7	15	5.6	1	0.4			**269**
Developing new ideas	VET	23	17.4	75	56.8	26	19.7	5	3.8	3	2.3			**132**
	non-VET	13	9.6	67	49.3	42	30.9	12	8.8	2	1.5			**136**
	Total	36	13.4	142	53.0	68	25.4	17	6.3	5	1.9			**268**
Tackling unfamiliar problems	VET	20	15.2	80	60.6	23	17.4	5	3.8	1	0.8	3	2.3	**132**
	non-VET	16	11.7	78	56.9	28	20.4	13	9.5	1	0.7	1	0.7	**137**
	Total	36	13.4	158	58.7	51	19.0	18	6.7	2	0.7	4	1.5	**269**
Using new forms of technology	VET	36	27.3	63	47.7	22	16.7	6	4.5	4	3.0	1	0.8	**132**
	non-VET	25	18.2	54	39.4	33	24.1	21	15.3	4	2.9			**137**
	Total	61	22.7	117	43.5	55	20.4	27	10.0	8	3.0	1	0.4	**269**
Using information technology	VET	38	28.8	55	41.7	23	17.4	10	7.6	5	3.8	1	0.8	**132**
	non-VET	27	19.9	53	39.0	31	22.8	21	15.4	3	2.2	1	0.7	**136**
	Total	65	24.3	108	40.3	54	20.1	31	11.6	8	3.0	2	0.7	**268**
Understanding and tolerance of other cultures	VET	19	14.4	49	37.1	37	28.0	17	12.9	8	6.1	2	1.5	**132**
	non-VET	10	7.4	43	31.6	51	37.5	22	16.2	9	6.6	1	0.7	**136**
	Total	29	10.8	92	34.3	88	32.8	39	14.6	17	6.3	3	1.1	**268**
Specific job related skills	VET	43	32.8	52	39.7	22	16.8	9	6.9	4	3.1	1	0.8	**131**
	non-VET	17	12.5	28	20.6	49	36.0	32	23.5	9	6.6	1	0.7	**136**
	Total	60	22.5	80	30.0	71	26.6	41	15.4	13	4.8	2	0.7	**267**

Note: $\chi2$ p values for school VET/non-VET: Collecting & analysing information 0.08; Developing new ideas 0.04*; Using new forms of technology 0.015*; Specific job related skills < 0.001*.

Table A12: Employment while at school by gender and school VET participation

Job while at school	School VET		Non-school VET		Total	
	No.	%	No.	%	No.	%
Male	33	45.2	29	55.8	**62**	**49.6**
Female	37	62.7	50	58.1	**87**	**60.0**
Total	**70**	**53.0**	**79**	**57.2**	**149**	**55.2**

Table A13: Hours worked in employment at school by school VET participation and gender

Student	Hours worked										
	No job		1 to 5		6 to 10		11 to 16		16 or more		Total
	No.	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*	*No.*
Male school VET	41	56.2	6	8.2	14	19.2	3	4.1	9	12.3	**73**
Male school non-VET	24	46.2	10	19.2	13	25.0	1	1.9	4	7.7	**52**
Female school VET	23	39.0	9	15.3	13	22.0	8	13.6	6	10.2	**59**
Female school non-VET	38	44.2	10	11.6	16	18.6	18	20.9	4	4.7	**86**
Total	**126**	**46.7**	**35**	**13.0**	**56**	**20.7**	**30**	**11.1**	**23**	**8.5**	**270**

Note: χ^2 p value male school VET/school non-VET 0.285, female school VET/school non-VET 0.495

Table A14: Comparison of respondents' involvement in community groups at school and currently by school VET participation and gender

	School involvement					Current involvement				
	Involved		Not involved		Total	Involved		Not involved		Total
	No.	*%*	*No.*	*%*	*No.*	*No.*	*%*	*No.*	*%*	*No.*
Male school VET	47	64.4	26	35.6	73	38	54.3	32	45.7	**70**
Male school non-VET	43	82.7	9	17.3	52	24	46.2	28	53.8	**52**
Total male	**90**	**72.0**	**35**	**28.0**	**125**	**62**	**50.8**	**60**	**49.2**	**122**
Female school VET	37	62.7	22	37.3	59	22	38.6	35	61.4	**57**
Female school non-VET	63	73.3	23	26.7	86	37	44.6	46	55.4	**83**
Total female	**100**	**69.0**	**45**	**31.0**	**145**	**59**	**42.1**	**81**	**57.9**	**140**

Note: χ^2 p values involvement while at school: males school VET/ non-VET 0.025*, females school VET/ non-VET 0.178; current involvement: males school VET/ non-VET 0.374, females school VET/ non-VET 0.481.

Table A15: Post-school education and training outcomes compared by school VET participation and gender

	Full-time university study*	**Part-time university study**	**Full-time TAFE study**	**Part-time TAFE study**	**Full-time study at other institution**	**Part-time study at other institution**	**Apprentice/ trainee (and institution)#**	**Apprentice/trainee (no institution)^**	**Apprentice/trainee (total)**	**Total in education or training**	**Total**
	%	%	%	%	%	%	%	%	%	%	No.
Male school VET	8.2	2.7	26.0	34.2	1.4	2.7	42.5	4.1	46.6	75.3	**73**
Male school non-VET	36.5	1.9	21.2	21.2	5.8	9.6	40.4	11.5	51.9	92.3	**52**
Female school VET	25.4	1.7	20.3	20.3	6.8	5.1	18.6	5.1	23.7	78.0	**59**
Female school non-VET	60.5	1.2	16.3	10.5	3.5	1.2	17.4	3.5	20.9	94.2	**86**
Total (%)	**34.1**	**1.9**	**20.7**	**21.1**	**4.1**	**4.1**	**28.8**	**5.6**	**34.4**	**85.2**	**270**
Total (no.)	**92**	**5**	**56**	**57**	**11**	**11**	**78**	**15**	**93**	**230**	**270**

Note: Full-time university study χ^2 p value < 0.001* male school VET/ non-VET; Part-time TAFE study χ^2 p value 0.006* school VET/ non-VET; Total in education or training χ^2 p value 0.014* male school VET/ non-VET, χ^2 p value 0.004 female school VET/ non-VET. Sums for rows are greater than 100% as some respondents have commenced more than one type of training. # Commenced apprenticeship/traineeship and indicated post-school education and training at an educational institution. ^Commenced apprenticeship/traineeship but indicated no post-school education and training at an educational institution.

Table A16: Area of post-school apprenticeship/traineeship and area of current job according to school VET/school non-VET study

Area of apprenticeship/ traineeship		Area of current job										
		No current job		Technology and trades		Business and clerical		Human services		Primary industry		Total
		No.	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*	*No.*
Technology and trades	school VET			25	92.6			2	7.4			**27**
	school non-VET			20	90.9					2	9.1	**22**
Business and clerical	school VET	1	14.3			6	85.7					**7**
	school non-VET	1	20.0			3	60.0	1	20.0			**5**
Human services	school VET							10	100.0			**10**
	school non-VET	1	16.7					5	83.3			**6**
Primary industry	school VET									4	100.0	**4**
	school non-VET							1	11.1	8	88.9	**9**
Other	school VET							1	100.0			**1**
	school non-VET											
Total	**school VET**	**1**	**2.0**	**25**	**51.0**	**6**	**12.2**	**13**	**26.5**	**4**	**8.2**	**49**
	school non-VET	**2**	**4.8**	**20**	**47.6**	**3**	**7.1**	**7**	**16.7**	**10**	**23.8**	**42**

Table A17: Status of current job by school VET participation and gender

	Casual		**Part-time**		**Full-time**		**Self-employed**		**Voluntary**		**No current job**		**Total**
	No.	%	No.	%	No.	%	No.	%	No.	%	No.	%	No.
Male school VET	15	20.5	1	1.4	49	67.1	2	2.7	2	2.7	4	5.5	**73**
Male school non-VET	14	26.9	3	5.8	30	57.7	0	0.0	0	0.0	5	9.6	**52**
Female school VET	20	33.9	9	15.3	20	33.9	0	0.0	1	1.7	9	15.3	**59**
Female school non-VET	38	44.2	9	10.5	23	26.7	2	2.3	2	2.3	12	14.0	**86**
Total	**87**	**32.2**	**22**	**8.1**	**122**	**45.2**	**4**	**1.5**	**5**	**1.9**	**30**	**11.1**	**270**

Note: χ^2 p value 0.028* full-time school VET/non-VET; 0.029* casual school VET/non-VET; <0.001* full-time male/female; 0.003* part-time male/female; < 0.001* casual male/female.

Table A18: Types of employment undertaken by students since leaving school

	Full-time	**Casual**	**Part-time**	**Self-employed**	**Voluntary**	**Total**	
	%	%	%	%	%	No.	%
Current job	45.2	32.2	8.1	1.5	1.9	**240**	**88.9**
Job 2	16.3	38.1	6.7	0.4	0.6	**179**	**66.3**
Job 3	10.7	23.0	5.2	0.4	4.1	**117**	**43.3**
Job 4	3.3	11.5	3.3	0.4	4.4	**62**	**23.0**
Job 5	2.2	6.7	1.5	0.0	2.2	**34**	**12.6**
Job 6	0.0	4.4	0.0	0.0	0.7	**14**	**5.2**
Job 7	0.0	1.9	0.0	0.0	0.7	**7**	**2.6**

Table A19: Area of current job by school VET participation and gender

	Area of current job										
	Technology and trades		Business and clerical		Human services		Primary industry		Other		Total
	No.	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*	*No.*
Male school VET	27	39.1	4	5.8	13	18.8	24	34.8	1	1.4	**69**
Male school non-VET	20	42.6	2	4.3	10	21.3	12	25.5	3	6.4	**47**
Female school VET	2	4	9	18	31	62	7	14	1	2	**50**
Female school non-VET	3	4.1	12	16.2	46	62.2	11	14.9	2	2.7	**74**
Total	**52**	**21.7**	**27**	**11.3**	**100**	**41.7**	**54**	**22.5**	**7**	**2.9**	**240**

Note: Technology and trades and human services χ^2 p value < 0.001* male/female school VET and school non-VET; business and clerical χ^2 p value 0.004* male/female school VET, χ^2 p value 0.019* male/female school non-VET; primary industry χ^2 p value 0.022* male/female school VET, χ^2 p value 0.041* male/female school non-VET.

Table A20: Area of current job and job status comparing outcomes by previous school VET participation

	Area of current job	Current job status						
		Casual	Part-time	Full-time	Self-employed	Voluntary	Total	
		%	%	%	%	%	%	*No.*
School VET	Technology and trades	3.4	0.8	20.2			**24.4**	**29**
	Business and clerical	0.8	1.7	8.4			**10.9**	**13**
	Human services	14.3	5.9	13.5	0.8	2.5	**37.0**	**44**
	Primary industry	9.2		16.0	0.8		**26.1**	**31**
	Other	1.7					**1.7**	**2**
	Total	**29.4**	**8.4**	**58.0**	**1.7**	**2.5**	**100.0**	**119**
School non-VET	Technology and trades	0.8		18.2			**19.0**	**23**
	Business and clerical	1.7	0.8	9.1			**11.6**	**14**
	Human services	27.3	7.4	8.3	1.7	1.7	**46.3**	**56**
	Primary industry	10.7	1.7	6.6			**19.0**	**23**
	Other	2.5		1.7			**4.1**	**5**
	Total	**43.0**	**9.9**	**43.8**	**1.7**	**1.7**	**100.0**	**121**

Note: χ^2 p value significant for job area compared with job status for school VET χ^2 p = 0.01* and highly significant for school non-VET χ^2 p < 0.0001*. School VET/school non-VET job status χ^2 p=0.216. Jobs in primary industry were more likely to be full-time for school VET students than for school non-VET students (χ^2 p value 0.031*) as are jobs in the human services area (χ^2 p value 0.06).

Table A21: Area of current job and job status comparing outcomes by gender

	Area of current job	Current job status						
		Casual	Part-time	Full-time	Self-employed	Voluntary	Total	
		%	%	%	%	%	%	No.
Male	Technology and trades	2.6	0.9	37.1			**40.5**	**47**
	Business and clerical	0.9		4.3			**5.2**	**6**
	Human services	6.9	2.6	7.8	0.9	1.7	**19.8**	**23**
	Primary industry	12.1		18.0	0.9		**31.0**	**36**
	Other	2.6		0.9			**3.5**	**4**
	Total	**25.0**	**3.5**	**68.1**	**1.7**	**1.7**	**100.0**	**116**
Female	Technology and trades	1.6		2.4			**4.0**	**5**
	Business and clerical	1.6	2.4	12.9			**16.9**	**21**
	Human services	33.9	10.5	13.7	1.6	2.4	**62.1**	**77**
	Primary industry	8.1	1.6	4.8			**14.5**	**18**
	Other	1.6		0.8			**2.4**	**3**
	Total	**46.8**	**14.5**	**34.7**	**1.6**	**2.4**	**100.0**	**124**

Note: χ^2 p value significant for job area compared with job status for males 0.001* and for females 0.037*. χ^2 p<0.001* for job status by gender.

Table A22: Individual outcomes for students of their participation in school VET courses

	Gender	Strongly agree	Agree	Neutral	Disagree	Strongly disagree
Influence of school VET on:		%	%	%	%	%
(a) completing senior secondary study	Male	1.9	13.2	43.4	32.1	9.4
	Female	6.0	22.0	30.0	32.0	10.0
(b) improved literacy/numeracy	Male	3.8	26.4	39.6	22.6	7.5
	Female	4.0	26.0	26.0	22.0	22.0
(c) community involvement	Male	3.7	9.3	50.0	29.6	7.4
	Female	4.0	20.0	40.0	22.0	14.0

Note: χ^2 p values (a) 0.475, (b) 0.273, (c) 0.366

Table A23: Breakdown of work placement students by gender

	Male school VET		Female school VET		Total school VET students	
	No.	% of male school VET respondents	No.	% of female school VET respondents	No.	% of total school VET respondents
Work placement	36	49.3	38	64.4	74	56. 1

Note: male/female χ^2 p values 0.082

Table A24: Cross-tabulation of offers of employment and apprenticeship/traineeship from work placement employer while still at school and after having left school.

Type of offer	Timing of offer							
	While still at school		After left school		Both while at school and after left school		Total	
	No.	*% of those doing a work placement*	*No.*	*% of those doing a work placement*	*No.*	*% of those doing a work placement*	*No.*	*% of those doing a work placement*
Offered employment	18	24.3	21	28.4	12	16.2	**27**	**36.5**
Offered apprenticeship/ traineeship	3	4.1	8	10.8	0	0	**11**	**14.9**
Offered both employment and apprenticeship/ traineeship	0	0	2	2.7	0	0	**2**	**2.7**
Total	**21**	**28.4**	**27**	**36.5**	**12**	**16.2**	**36**	**48.7**

Note: the totals were adjusted to account for multiple offers

Table A25: Skills gained from work placement by school VET area of study

	School VET area of study									
	Technology and trades		Business and clerical		Human services		Primary industry		Work skills	
	No.	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*
(Agree) my work placement helped me to gain skills in:										
Collecting and analysing information	9	56.3	9	75.0	11	47.8	3	100.0	8	47.1
Communicating with others	14	87.5	12	100.0	22	95.7	3	100.0	16	94.1
Planning and organising activities	8	50.0	9	75.0	16	69.6	2	66.7	14	82.4
Working with others and in teams	13	81.3	11	91.7	21	91.3	2	66.7	16	94.1
Solving problems and making decisions	13	81.3	10	83.3	18	78.3	3	100.0	15	88.2
Developing new ideas	9	56.3	8	66.7	16	69.6	3	100.0	14	82.4
Tackling unfamiliar problems	12	75.0	10	83.3	16	69.6	2	66.7	16	94.1
Using new forms of technology	13	81.3	11	91.7	16	69.6	2	66.7	14	82.4
Using information technology	9	56.3	11	91.7	9	39.1	3	100.0	13	76.5
Understanding and tolerance of cultures	6	37.5	7	58.3	12	52.2	1	33.3	11	64.7
Specific job related skills	11	68.6	9	75.0	15	65.2	3	100.0	13	76.5
Total	**16**	**22.5**	**12**	**16.9**	**23**	**32.4**	**3**	**4.2**	**17**	**23.9**

Table A26: Outcomes for work placement and non-work placement students

Outcome		Did a work placement		Did not do a work placement	
		No.	% (of school VET students doing a work placement)	No.	% (of school VET students not doing a work placement)
Completed year 12		58	78.4	54	93.1
Value of senior school experience	Highly valued	8	11	13	23.6
	Neutral	44	60.3	36	65.5
	Poorly valued	21	28.8	6	10.9
Had a job related to school VET course since leaving school		49	66.2	14	38.9
Currently employed		65	87.8	54	93.1
Commenced or completed an apprenticeship/traineeship		30	40.5	18	31
Post-school education and training		60	81.1	41	70.7
Casual job while at school		44	59.5	36	44.8

Note: χ^2 p value 0.019* completed year 12 did/did not do a work placement; 0.019* value of senior school; 0.007* job related to school VET course; 0.315 currently employed; 0.26 commenced or completed an apprenticeship/traineeship others non-significant; 0.162 post-school education and training; 0.095 casual job while at school.

Table A27: Offers of employment or an apprenticeship/traineeship to work placement students while at school by when they left school.

Offer	Left school											
	During Year 11		At the end of Year 11		During Year 12		At the end of Year 12		At the end of Year 13		Total	
	No.	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*
Employment from work placement while at school	1	5.6	3	16.7	0	0.0	14	77.8	0	0.0	**18**	**100**
Apprentice/traineeship from work placement while at school	0	0.0	0	0.0	3	100.0	0	0.0	0	0.0	**3**	**100**
Total offers while at school	1	4.8	3	14.3	3	14.3	14	66.7	0	0.0	**21**	**100**
Work placement but no offers while at school	0	0.0	8	15.1	1	1.9	40	75.5	4	7.6	**53**	**100**
Total work placement students	1	1.4	11	14.9	4	5.4	54	73	4	5.4	**74**	**100**
School VET non-work placement	1	1.7	0	0.0	3	5.2	54	93.1	0	0.0	**58**	**100**
Total school VET students	**2**	**1.5**	**11**	**8.3**	**7**	**5.3**	**108**	**81.8**	**4**	**3.0**	**132**	**100**

Table A28: Status of current job by school VET area of study and gender

	School VET study area	Status of current employment												
		No current job		Casual		Part-time		Full-time		Self-employed		Voluntary		Total
		No.	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*	*No.*
Male	Technology and trades	1	4.5	2	9.1	1	4.5	17	77.3			1	4.5	**22**
	Business and clerical			2	66.7			1	33.3					**3**
	Human services			3	25.0			7	58.3	1	8.3	1	8.3	**12**
	Primary industry			4	36.4			7	63.6					**11**
	Work skills							6	100.0					**6**
	Total males	**1**	**1.9**	**11**	**20.4**	**1**	**1.9**	**38**	**70.4**	**1**		**2**	**3.7**	**54**
Female	Technology and trades					1	50.0	1	50.0					**2**
	Business and clerical	1	7.1	5	35.7	3	21.4	4	28.6			1	7.1	**14**
	Human services	3	17.7	5	29.4	3	17.7	6	35.3					**17**
	Primary industry			1	100.0									**1**
	Work skills	5	33.3	4	26.7	2	13.3	4	26.7					**15**
	Total females	**9**	**18.4**	**15**	**30.6**	**9**	**18.4**	**15**	**30.6**			**1**	**2.0**	**49**
Total		**10**	**9.7**	**26**	**25.2**	**10**	**9.7**	**53**	**51.5**	**1**	**1**	**3**	**2.9**	**103**

Table A29: Area of current job for school VET students by participation in post-school education and training, and gender

Participation in post-school education and training		Area of employment													
		No current job		Technology and trades		Business and clerical		Human services		Primary industry		Other		Total	
		No.	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*	*No.*	*%*
Yes	Male	4	7.3	26	47.3	4	7.3	9	16.4	11	20.0	1	1.8	**55**	**100**
	Female	8	17.4	1	2.2	8	17.4	25	54.3	4	8.7	0	0.0	**46**	**100**
No	Male	0	0.0	1	5.6	0	0.0	4	22.2	13	72.2	0	0.0	**18**	**100**
	Female	1	7.7	1	7.7	1	7.7	6	46.2	3	23.1	1	7.7	**13**	**100**
Total		**13**	**9.9**	**29**	**22.0**	**13**	**9.9**	**39**	**29.6**	**31**	**23.5**	**2**	**15.2**	**132**	**100**

Note: χ^2 p value < 0.001* Participation in post-school education and training yes/no by area of employment; primary industry area compared to all other areas χ^2 p value 0.001*

Appendix B: Summary of school VET systems by state

The following summary presents information on delivery and recognition of school VET courses in each of the six Australian states. It is intended as an overview only of the key characteristics of each state system. The purpose of this material is to provide contextual information to inform interpretation of the findings from the current study.

New South Wales

Various VET courses comprise the school VET offerings in New South Wales. These include courses based on endorsed training packages and accredited under the AQF, as well as courses developed and/or endorsed by the Board of Studies and accredited by VETAB.[14] School-based part-time traineeships are also included in school VET offerings. The state also has a TAFE/VET (TVET) system, whereby HSC students complete VET courses usually taught by a TAFE teacher in a TAFE College, and receive the HSC as well as advanced standing for further TAFE study. Since 2001 school VET courses developed/endorsed by the Board of Studies as part of the HSC have also allowed students to gain advanced standing in many TAFE courses. Policy in New South Wales now states that all vocational courses in the post-compulsory years need to be dual accredited (Higher School Certificate and credit towards an AQF qualification). Some school VET courses can also count towards the University Admission Index (UAI).

Queensland

In Queensland schools, much VET is embedded in subjects registered by the Queensland Board of Senior Secondary School Studies, and nationally accredited. Other models include stand-alone TAFE courses, and part-time traineeships and apprenticeships. The state is committed to the establishment and development of school-based new apprenticeships. All school VET study that is accredited by AQF is included on the Queensland Senior Certificate. In general, VET courses studied at school cannot be directly counted towards an Overall Position (OP) score for university entrance.

South Australia

In 1998 the majority of school VET courses offered were embedded in subjects recognised by the Senior Secondary Assessment Board of South Australia, leading to dual accreditation (South Australian Certificate of Education and AQF qualification). A smaller number of VET subjects were offered on a stand alone basis. These also received dual accreditation. School VET study attracted credit from post-school VET providers. At that time, some VET study (the Vocational Studies course) could also indirectly contribute towards university entrance. In more recent years, the number of stand alone school VET courses has increased. The state has also begun implementation of a policy whereby VET study can be directly counted towards university entrance (Tertiary Entrance Rank).

[14] Vocational Educational Training and Accreditation Board (in New South Wales).

Tasmania

All school VET subjects offered in 1998 were stand alone, and offered students an AQF qualification only. The state is currently undergoing an extensive review of school VET, with a view to implementing changes in recognition of VET courses, including the introduction of dual accreditation (Tasmanian Certificate of Education and AQF qualification), and recognition towards university entrance. School-based new apprenticeships were not offered in 1998, and there is a low rate of uptake at the present time. Further development and expansion of school-based new apprenticeships is also planned.

Victoria

The Victorian system of school VET provides for students to complete VET studies as Victorian Curriculum and Assessment Authority (VCAC) accredited subjects. This allows students to receive dual accreditation (Victorian Certificate of Education, and an AQF qualification). In Victoria complete VET courses are offered, mostly on a stand alone basis, although a small number of VET subjects is embedded within VCAC courses. School-based part-time apprenticeships are also offered as part of the school VET program. School VET courses contribute directly to university entrance scores, and this has been the case for several years.

Western Australia

Western Australia offers both stand alone VET, as well as VET embedded in Curriculum Council endorsed subjects. All VET offered receives dual accreditation (Western Australian Certificate of Education, plus AQF qualification). While students receive credit for school VET courses if they continue with further study in the VET sector, at the present time these courses are not recognised for university entrance purposes. This situation is currently under review, and changes are expected to be implemented.

Appendix C: Case studies

Three case studies illustrating rural school VET pathways are provided, drawn from the Tasmanian, South Australian and Western Australian clusters. These clusters were chosen as case studies for different reasons: the Tasmanian cluster illustrates in some detail the main pathways for both school VET and non-VET students and highlights a variety of benefits of work placements for school VET students; the South Australian case study demonstrates the value of school VET programs provided as a pathway to local employment and the crucial role of work placements in these programs; and the Western Australian case study highlights a range of primary industry pathways as well as other pathways from school VET. Profiles of the sites provided at the beginning of each case study are based on details supplied in the Methodology chapter in the full report.

Tasmanian case study

The Tasmanian site is in an area of low average regional economic growth, with high youth unemployment and high levels of welfare dependence. Industries include primary industry, plus paper manufacturing in the large rural community. Expected future employment growth areas include hospitality and tourism, business, health and community services, as well as manufacturing related to primary industry.

School VET courses were introduced in the mid 1990s, designed to provide post-school pathways to limited local employment, as well as to provide generic workplace skills and awareness. School VET is strongly supported by the local community. In 1998, school VET courses with the highest enrolments were work skills (work education), automotive and foundation engineering, business, hospitality, IT and retail. Respondents to the study largely reflected this pattern. No courses were offered in primary industry in 1998. Notably, a high level of Tasmanian school VET students (94%) completed a work placement, compared with other states, and the majority expressed satisfaction with their work placements.

Consistent with the low school retention rate in the north-west of Tasmania, one-third of the school VET students who participated in the survey did not complete Year 12, compared with 13% of non-VET students. Students who participated in work skills or human services school VET were more likely to complete Year 12 than school VET students in other areas. Of the early school leavers, all but one were in current paid employment.

In terms of post-school pathways, nearly three-quarters of school VET students went on to post-school VET study. A much higher percentage of school non-VET students went onto to university study than school VET students, although it must be noted that in Tasmania in 1998 school VET subjects were not recognised for university entrance purposes. Relatively high rates of school VET students who undertook technology and trades courses continued with post-school VET studies, compared with human services students and business and clerical students. Those most likely to continue with further full-time studies were work skills students. In terms of employment, of those students (school VET and non-VET) who are currently employed, 83% are employed in a rural area. The main area of employment at the time of the survey for all Tasmanian cluster respondents was in human services (community services, health, education, sales and personal services, tourism and hospitality).

Pathways for school VET students

Pathway 1: Local employment

In general, this was the main pathway for school VET students, including early school leavers. A pathway to local employment was most closely associated with participation in a work skills (mainly females), business and clerical (all females) or technology and trades (all males) school VET course. This pathway was mainly through full-time apprenticeships and traineeships, often in the same industry area as their school VET course. About half of the students who followed this pathway had had a part-time job while still at school. Interestingly, less than half of this group identified career-related reasons for selecting their school VET course.

A number of this group had gained local employment as the result of employment offers from work placement employers and, as well as currently living locally, indicated their intention to stay in their local area. They indicated the relevance of the work placement component of their school VET course in terms of increasing their communication and teamwork skills, and levels of self-confidence, and specifically because of the way in which they helped to build linkages with local employers. Daniel,[15] who completed a music industry school VET course and is now self-employed locally in the music industry, noted the importance of work placements in helping him to make 'contacts within the music industry'. Sally, an early school leaver, who is currently completing a hairdressing apprenticeship in her local community, noted:

> …the [work] placement was [relevant]. It helped local employers because I showed them my skills and initiative first hand.

Pathway 2: Further VET study combined with work

The second most popular pathway for school VET students was a combination of post-school VET study (excluding apprenticeships and traineeships) and work. The majority of this group had chosen their school VET course for career reasons. For most, their post-school VET study was in a similar area to their school VET course. For about half the group, employment was also in a related area, but for the remainder, employment was unrelated to either the school VET course or to post-school study. From the questionnaires, it was not possible to tell whether work and study were undertaken concurrently or separately; therefore it is difficult to assess the extent to which post-school study contributed to gaining employment.

Although most of this group had not been offered a job by their school VET work placement employer, they found their work placements useful, particularly as an introduction to the broader world of work. For example, Sarah, who intends to remain in her local community, partly completed a school VET course in hospitality. She is now working part-time in retail, and also studying hospitality part-time, having received some credit for her school VET course. Sarah was positive about her school VET experience, particularly the work placements:

> The work placements were really good because you got to meet new people and see how different places run.

Simon, on the other hand, chose a school VET course in information technology for career reasons, and was offered work by his work placement employer while at school, and after leaving school. Currently, however, Simon is working full-time in a local retail outlet, and has undertaken post-school study in this field (Certificate III in Retail). He indicated he was unlikely to remain in his local community, and this may be possibly for career-related reasons, but that he would be likely to live in another rural/regional area during his working life.

[15] Surveys were completed anonymously, so names in these case studies are fictitious.

Other pathways

Respondents reported a variety of other pathways, but these were less common than the pathways to local employment, or the further study combined with work pathways, described above. Several described how the work placement component of their school VET course had helped them to decide on a career (sometimes in the same area as their school VET study and sometimes not). For example, Margie now has casual work in the hospitality industry in the small West Coast community in which she lives, where hospitality and tourism are the mainstay of the local economy. She commented that her school VET course in work skills, which she chose for general interest, had built her self-confidence and that 'by doing work placement helped me decide that I wanted to go into hospitality'. However, Margie does not intend to stay in this community in the future, and may need to consider gaining formal qualifications in the hospitality industry if she is to compete for employment in a larger rural or regional centre. Rebecca, on the other hand, chose to do a work skills school VET course because she didn't know what she wanted to do when she left school. She was one of only three school VET students surveyed who subsequently chose to go on to tertiary study. However, she noted that school VET had allowed her to 'explore careers and I made my decision to become a nurse through my work placements'. Rebecca intends to return to her local community to work after she has completed her study.

Pathways out of the community

Although most of the school VET students surveyed had remained in, or intended to return to, their local community, some indicated their intention not to do so. Of this group, most were in study or employment that was not related to their school VET study area. Half had already left the community to undertake studies elsewhere, and indicated they would not return. The remainder were currently working full-time in their local community, mainly in apprenticeships/traineeships. It seems likely that this group planned to complete their apprenticeships/traineeships before moving away.

Despite their intentions not to remain in their local community, nearly all of this group indicated they had found their school VET course and work placements to be useful, particularly in terms of improving literacy/numeracy skills, and nearly all indicated they intended to live in another rural/regional area during their working life, suggesting a transfer of skills to other rural/regional settings. Early school leaver, Brian, currently completing a diesel mechanic apprenticeship in his local community, is typical of this group, when he comments on the role of the school VET course in facilitating youth mobility:

> VET gave me communication skills and prepared me for job opportunities. It also helped me how to look for work and what to say and do at interviews.

Sophie's pathway out of her local community is interesting because it led her to live in another rural community and to utilise her skills gained from a business and clerical school VET course for the good of her adopted community. An early school leaver, Sophie reported active participation in a number of voluntary community groups, in areas including lifelong learning, family and child health, and craft and recreation, and it seems likely that her roles in these areas draw in part upon training provided by her school VET course. At the same time, she is currently enrolled in post-school VET study in the business and clerical area. Sophie is not currently in the labour force, opting to combine motherhood with voluntary community work and study.

Less positive experiences of school VET

For two students, school VET does not appear to have been a positive experience. Amy has done no post-school study and has had no employment since leaving school. She chose the work skills school VET course for general interest but is unsure whether the course and work placements have been useful to her. Amy did not have part-time work while still at school, and was not offered employment by her work placement employer. She is currently seeking work, and intends to stay in her local community, suggesting that she may need to consider post-school VET study to enhance her employment chances.

Bianca, on the other hand, chose a hospitality school VET course for several reasons, including career, general interest and on the recommendation of teachers. Like Amy, she did not have a part-time job at school, and was not offered employment by her work placement employer. Bianca indicated that she did not find the school VET course and work placements useful. Subsequently, she chose to continue with full-time tertiary study in an area unrelated to her school VET course, and moved away from her local community to pursue full-time study. Unlike a number of tertiary students, Bianca has no casual employment to help fund her studies, despite having completed a school VET course in hospitality. She has no intention of returning to her local community when she has completed her studies, nor does she intend to live in another rural/regional area during her working life.

Pathways for school non-VET students

Pathway 1: Tertiary study

Unlike the school VET students who participated in the survey, the main post-school pathway for school non-VET students was tertiary study, primarily in the areas of human services (Arts/Education) and technology (Science/Engineering), and mainly at the University of Tasmania campuses in either Launceston or Hobart. Several were studying on the mainland, but nearly all of these students still listed their local Tasmanian community as their normal place of residence. However, the majority of all respondents undertaking tertiary studies indicated they were either unsure or unlikely to return to the locality in which they attended school, but that they would probably live in another rural or regional area during their working life. The majority also reported having current casual or part-time work as well, presumably to help fund their tertiary studies.

Pathway 2: VET and employment

The second main pathway for school non-VET students was post-school VET, mainly in the form of apprenticeships/traineeships, but including post-school VET study not linked to apprenticeships or traineeships. However, far fewer school non-VET students compared with school VET students continued with a VET pathway. Of the small number of early school leavers who had not completed a school VET course, nearly all had secured apprenticeships and traineeships. Half of the school non-VET students who have continued with post-school VET have left their local community in Tasmania to continue their VET studies in mainland Australia. This group indicated they were unlikely to return to their local community or to live in another rural/regional community during their working life. Typical of this group is Michael, who left his community to undertake an aircraft maintenance apprenticeship in the Royal Australian Air Force in Queensland.

Of those who are participating in post-school VET locally, only one, Jason, indicated he is likely to remain in his local community in the future. Jason, an early school leaver, is undertaking an aquaculture traineeship, an industry closely linked to his small community’s local economy. Others, however, were either unsure or unlikely to remain in their local community in the future. However, this group did indicate they were likely to live in another rural/regional community during their working life.

Other pathways

Very few other pathways were listed for school non-VET respondents. Although this may suggest that nearly all of this group had gone onto some form of post-school study, it must be remembered that this reflects the bias of the sample towards such students.

South Australian case study

The South Australian cluster of three public schools is situated in a region of medium to low economic growth with unemployment levels comparable to the national average but restricted employment opportunities for youth. The main industries include agriculture, aquaculture, viticulture and forestry.

The SA cluster was established in 1997, with a focus on helping youth find local employment. Courses considered most likely to result in employment are building and construction, hair and beauty, automotive and engineering pathways. Other VET areas within the cluster include viticulture, forestry, aquaculture, racing, business and clerical, community services and health, furnishing, hospitality, retail, and tourism. Three-quarters of the South Australian respondents remained in their local area, with others moving to a capital city (mainly Adelaide) for further education and training or employment.

Pathways to local employment

The majority of school VET respondents from the South Australian cluster undertook their VET course in primary industries (mainly viticulture) or technology and trades (mainly engineering pathways) and participated in a work placement. The school VET programs seem to have been largely successful in terms of equipping students with skills that are relevant locally. The majority of school VET respondents were currently employed locally in the same industry as their school VET course. However, it must be noted that the majority of school non-VET respondents were also employed locally in these same industry areas with no great difference between these school VET and non-VET respondents in terms of the status (casual, part-time, full-time) of their local job, whether it was an apprenticeship/traineeship or not, or in their uptake of other post-school education and training. However, the advantage of school VET programs is possibly summed up by Adam who, having done the viticulture program with a work placement, had gone onto local full-time employment in vineyards and orchards:

> You (have) already gained the skills to go into the workplace before you leave school rather than training after you leave school.

Further VET study combined with work

Adam indicated he was motivated to do his school VET course partly out of a desire for a career in the industry and had gone on to complement his employment in the industry with TAFE training to gain specific qualifications relevant to such work, such as a truck license and chemical handling training. Thus the school VET program provided foundational skills and experience relevant to a job in local industry, and potentially, future career development.

Other pathways

Peter had also done the viticulture course mainly because subject choices were limited, did not do a work placement and had gone onto a range of mainly casual jobs in the local industry, working in the vineyards and wineries but had done no further education or training. Two other school VET students who had gone onto casual work in the vineyards had done their VET course in an unrelated industry and had chosen their school VET course because subject choices were limited. These students had done further part-time TAFE study unrelated to their employment or their school VET course. These diverse pathways or work/study mosaics suggest school VET may be an opportunity, amongst a limited range of choices, to gain an introduction to a job area for those unsure of a career direction.

Work placements as pathways to local employment

Work placements were an integral part of school VET programs intended as a pathway to local employment, with three-quarters of the school VET respondents from this cluster participating in a work placement. Most work placement students who went onto an apprenticeship/traineeship continued in the same industry area as their school VET course, and two of the work placement students gained recognition or advanced standing for their school VET course. An interesting case includes Anne who undertook a traditionally male dominated technology and trades school VET course that included a work placement because she wanted a career in a particular trade. She went onto gain an apprenticeship in the trade, receiving recognition for her school VET course by 'having time taken off my apprenticeship'.

Western Australian case study

This cluster of four schools is situated in a large, sparsely populated area of Western Australia with strong focus on primary industry, particularly grain production. Economic growth in the region is rated medium and local school principals perceive limited work opportunities and socio-economic disadvantage within the region. Youth unemployment is relatively high and many young people leave to seek employment elsewhere. The number of students continuing with university is low.

The cluster was established in 1997 and includes five schools, one of which is not represented in this study. Courses offered in 1998 included business, tourism and hospitality, primary industries (agriculture, Landcare), automotive, building and construction, and childcare. About 40% of the Western Australian respondents (mainly male) went to a selective agricultural senior secondary school where all students participate in school VET. A high proportion of these students were from farms in surrounding and remote areas.

The purpose of the school VET program within this cluster was as a pathway to local employment, although for the agricultural school 'local' would incorporate the rural industry more generally. School VET respondents were evenly distributed across industry areas, although males predominantly chose technology and trades and primary industry (particularly at the agricultural school), while females were more evenly spread between business and clerical, human services, and work skills. Respondents who had done a school VET course had a variety of outcomes, ranging from a fairly straightforward continuation in a related area, in many cases via an apprenticeship, to casual employment, despite undertaking further VET courses.

Primary industry pathways

The vast majority of the agricultural school students were employed in agriculture, many as farmers or farm hands probably on their family property. This is consistent with selection to the school being based to a certain extent on the student's demonstrated desire for a career in agriculture. For example, Geoff went to the agricultural school and undertook a 'trades course: automotive, metalwork, woodwork, building and construction' returning to the family farm full-time where he says 'the trades course helped me with the building and metalworking side of farming'. Almost all of those who indicated they were farmers or farmhands were working full-time but few continued with any post-school education and training. Some, however, like John who indicated he was a self-employed farmer on the family farm, continued on part-time through TAFE to gain a Certificate III in Agriculture. Those from the agricultural school not going back on the land as farmers or farmhands were often successful gaining an apprenticeship in a traditional trade or going into some other area of agriculture. Malcolm, for example, after a stint as a part-time farmhand obtained a full-time job in rural merchandise sales, later progressing to a territory sales manager. During this period he attended TAFE to gain a Diploma of Business Management. Although only a small number of respondents from the agricultural school went onto university, they all studied agribusiness.

Local employment combined with further VET study

Outcomes for respondents who had attended the other three schools were much more diverse in terms of industry of employment, as could be expected. About half had done a school VET course and these respondents were generally quite successful in gaining full-time employment and post-school VET qualifications related to their school VET course, often via an apprenticeship. Suzy, for example, whose school VET course was in 'business and tourism', went onto further full-time VET study gaining credit for her school VET studies to obtain a Certificate III in Travel consultancy. Her employment was as a full-time travel consultant first in her local town and later in a Perth suburb. She noted the most useful aspects of the school VET course were 'the variety of skills learnt and the way it focussed in on certain aspects that I was directly interested in'. Brett also did business studies as his school VET course, going onto local full-time employment first as a bank clerk then as a financial planner while doing part-time study at TAFE to gain a Diploma of Financial Planning. Brett stayed in his local community and said of his school VET course:

> it was great to get out in the community on work placement to meet the business people of the town. This was a help in building confidence and self-esteem.

Although most female school VET respondents had successful post-school employment and education pathways, they tended to be more at risk of casual employment than male school VET students, even if they had undertaken post-school VET studies. Hannah is a typical example, having done a school VET course in business studies followed by a Certificate III in Rural Office Practice part-time through TAFE. She stayed in her local community working in a range of casual and part-time jobs from shop assistant to conference communications assistant, waitress and, at the time of the survey, a part-time secretary. Her VET studies do not appear to have led to a full-time position in her local town.

School non-VET pathways

About half the school non-VET students went onto university. School non-VET students who did not go onto full-time university studies had on the main, similar post-school outcomes to school VET students, the only difference being a slightly greater number of casual and part-time jobs before achieving full-time employment.

Appendix D: Survey

UNIVERSITY OF TASMANIA

Information sheet

Survey into the destinations of rural youth

Chief investigator: Dr Sue Kilpatrick, Associate Director,
Centre for Research and Learning in Regional Australia,
University of Tasmania

What is the study about and why have I been chosen to participate?

Researchers from the University of Tasmania are conducting a nationwide study into the post-school destinations of rural youth. The study will include students from rural schools in each state who were enrolled in Year 11/12/13 in 1998. This study is important because it will investigate the particular study and employment choices of rural youth, and the reasons why they make those choices (e.g. is there a link between casual employment while still at school, and later study and employment choices? Is there a link between participation in VET-in-schools programs and later study and employment choices?). The study will also look at the factors which influence young people's decisions to either remain in, or leave, their local communities.

What do I have to do?

You have been sent a written questionnaire. Questionnaires have been sent to your former classmates also. You are asked to complete this questionnaire, preferably in blue or black ink, then return it in the Reply Paid envelope provided. It should only take about 15–20 minutes to complete. For nearly all questions, you will only need to tick or circle the best answer from a number of options. We realise that it is several years since you left school, but please try to answer all questions as best you can.

How will I benefit from participating in this study?

Although you have already completed your senior secondary studies, if you participate in this study, you will be doing something positive to help other young people from your rural community. The findings from this study will help to ensure that school-aged young people in your community and in other rural communities receive relevant education and training opportunities, and appropriate assistance in the transition from school to further study and/or work.

The findings will also help those young people who don't want to move away from their community after completing school, by suggesting ways in which governments, schools and communities can provide better opportunities to allow rural youth to remain in their local region.

Can I get a copy of the findings from the study?

Information, updates and selected findings from the project will be available on the Website of the Centre for Research and Learning in Regional Australia at http://www.crlra.utas.edu.au.

When the study finishes in September 2002, a full report of its findings will be provided to all participating schools. Anyone else interested in the full report may request a copy.

Will the answers that I give be confidential?

Yes. Every effort will be made to maintain confidentiality of research data. Data will be stored in a locked filing cabinet at the University of Tasmania, and will be used for research purposes only.

Will I be able to be identified in the study?

No. You are requested not to put your name on your questionnaire. After we have analysed the findings, they will be reported only in aggregate form so that no individual is identifiable.

What if I choose not to participate in the study?

Participation in the study is entirely voluntary. You may terminate your involvement in the study at any time without prejudice.

Contact person

If you have any queries about this study please contact the Chief Investigator:

Dr Sue Kilpatrick
Centre for Research & Learning in Regional Australia, University of Tasmania

phone (03) 6324 3018, fax (03) 6324 3040, or email Sue.Kilpatrick@utas.edu.au

Concerns or complaints

If you have any concerns of an ethical nature or complaints about the manner in which the project is conducted, you may phone the Chair or Executive Officer of the University Ethics Committee (Human Experimentation) on (03) 6226 2763.

Please note that this project has received ethical approval from the University Ethics Committee (Human Experimentation).

You will be given a copy of this information sheet to keep.

DRAFT LETTER FROM SCHOOL PRINCIPALS
(to go on school letterhead)

Dear Former Student

Re: Survey into the destinations of rural youth

The University of Tasmania is conducting national research into the post-school options and pathways of young people from rural and regional Australia, and our school has been invited to participate in this research. The study will survey former students from our school who were in Year 11/12/13 in 1998, including those who participated in VET-in-schools programs and those who did not.

We have agreed to mail out research materials to former students, on behalf of the University of Tasmania. Enclosed is the survey form, and an Information Sheet which provides further details about the study.

This research is important for our school and community, and for rural schools and communities in general. Findings from the research will help Federal and State governments to better meet the education and training needs of rural youth and their communities. I therefore urge you to participate in this study, by completing the enclosed survey form and returning it to the University of Tasmania in the Reply Paid envelope provided, by **Friday 4 January 2002.**

Yours sincerely

Principal