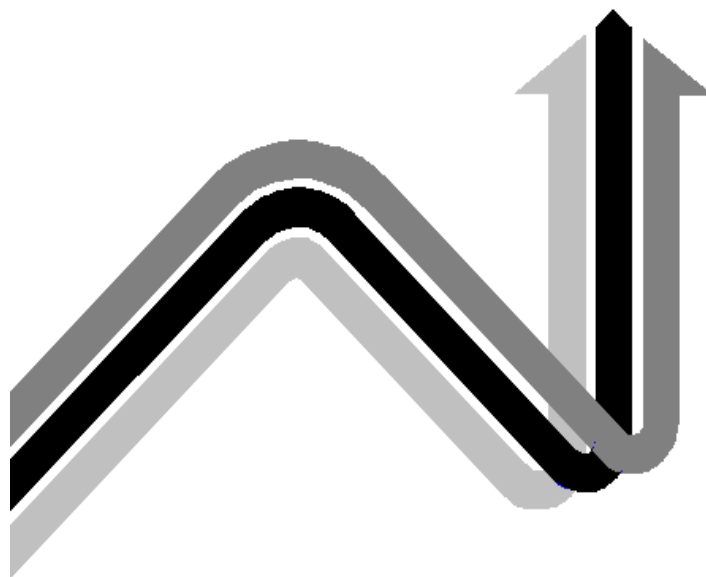


# **THEMATIC REVIEW OF THE TRANSITION FROM INITIAL EDUCATION TO WORKING LIFE**



## **AUSTRALIA**

### **BACKGROUND REPORT**

MARCH 1997

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## 1. CONTEXTUAL AND INSTITUTIONAL FACTORS

### **Population**

In 1993 the population of Australia was 18 million, having grown from 15 million in 1980. Population growth is projected by the World Bank to continue at a slightly reduced rate and reach 23 million by the year 2025. Although the overall population density is low (two inhabitants per square kilometre) it is a highly urbanised society with two-thirds of the population living in cities of more than 100 000 people; the two largest cities, Sydney and Melbourne contain 40 per cent of the population. Outside the cities the country is sparsely populated with small communities separated by vast distances.

The Australian population is mainly of European background although recent immigration has produced greater ethnic and cultural diversity. Largely as a consequence of immigration, the population more than doubled since 1950. One-third of Australians are either first or second-generation immigrants. In a departure from previous patterns, fewer than half of the post-1945 immigrants came from Britain or Ireland. During the 1950s and 1960s many immigrants arrived from southern European countries and more recently, the Middle East and South-East Asia have been important sources of immigrants. English remains the language of most activities in education. About 2.5 per cent of Australian school children are of Aboriginal descent, some of whom live in isolated communities.

### **Economy**

The World Bank classifies Australia as a high income country. In the 1992-93 financial year per capita GDP was just under A\$23 000 (US\$17 250). Within this generally affluent position the past few years have seen unemployment and overseas debt remain high. The economy, while growing relatively rapidly, had a rate of productivity increase below the OECD average (Burke, 1996). This situation has resulted in some attention being focused on education. The general political consensus has been that participation in education and training needed to be increased, curricula needed to be more relevant to national priorities, and that individuals and employers should finance an increasing share of the costs of educational expansion.

In general the labour force is well educated. In 1996 approximately one-half of the labour force held a post-school educational qualification (degree, diploma, certificate or trade qualification). In 1983 the equivalent proportion was 40 per cent. The growth in employment has been particularly rapid for degree holders. Over the past 20 years the proportion of full-time workers with university degrees has tripled to reach about 16 per cent in 1996. Even though there has been some decline in the relative earnings of university graduates, demand for tertiary education continued to grow through to 1996.

For the financial year 1990-91 total public and private expenditure on education was A\$21 billion, which represented 5.5 per cent of GDP (a decline from a peak of 6.3 per cent in the mid-1970s). The decline can be attributed largely to relatively static school enrolments and a fall in education costs. State and Federal governments supply more than 90 per cent of the funds for education. The States provide about 60 per cent

of all public expenditure on education (90 per cent of the expenditure on school education), and the Federal government provides 40 per cent (most of the expenditure on universities).

### **Youth unemployment and marginal employment**

High levels of unemployment among youth have been a cause of concern for the past two decades. Despite fluctuations over that time unemployment rates have remained disturbingly high. In November 1996, 11.2 per cent of the population aged 15 to 19 years was unemployed (ABS, 1996a). This corresponds to an unemployment rate for that age group of 19.8 per cent. The difference between these two indicators of unemployment arises because the unemployment rate refers to the percentage of the labour force who are unemployed and the number of people in the labour force is rather smaller than the total number of people in the population in a given age group. Among 20 to 24 year-olds 9.0 per cent of the population were unemployed and the unemployment rate was 11.1 per cent (ABS, 1996a). Burke (1996) notes that unemployment in general is most concentrated on those with the lowest levels of education and training (e.g. among persons aged 25-44 years the unemployment rate for those with bachelor degrees was 3.8 per cent compared to 10 per cent for those who did not complete secondary school). Unemployment among young people is higher for those who have not completed secondary school and those who have lower levels of achievement at school (Lamb, 1997).

### ***International comparisons***

Compared to other OECD countries youth unemployment in Australia appears to be high. Using 1992 data the OECD estimates the percentage of 15 to 24 year-olds who were unemployed at 12.5 per cent (OECD, 1995). This figure was in the top quarter of the 26 countries listed. The median percentage over the 26 countries was 7.7 per cent and the range was from 2.0 to 16.6 per cent. The Australian figure was a little higher than the figures for Canada (11.6%) and the United Kingdom (11.2%), and somewhat higher than the figures for the United States (8.9%) and Denmark (7.5%).

### ***Marginal employment***

In addition to a high level of unemployment among youth there appears to be a significant number of young people in marginal employment. Burke (1996) notes the general growth in part-time employment which made up 25 per cent of total employment in 1995 compared to 11 per cent in 1970 and Gregory (1995) draws attention to the decline in the availability of full-time jobs for those in the 15 to 19 and 20 to 24 age groups since 1970.

Sweet (1996) notes that since the beginning of the 1990s there has been an increase in the percentage of young people who are occupied in neither full-time study nor full-time employment. He characterises these young people as on the "margins" of study and work and estimates that the percentage of 15 to 19 year-olds in this category grew from 10 per cent in May 1990 to 18 per cent in May 1996. Using data from the ACER longitudinal surveys Sweet showed that during 1993 and 1994 significant proportions of 18 and 19 year-olds were on the margins for a significant period of time. In most months (other than the summer period when school leavers are seeking work and full-time students work in summer jobs) the figure was constant at around 19 to 20 per cent. During 1993 and 1994 more than one quarter of 18 and 19 year-olds spent nine or more months of the two year period "on the margins" of full-time work or study. These figures were even higher for those with low levels of earlier school achievement (among the bottom achievement quartile 40 per cent were on the margins for nine months or more) and those from lower socioeconomic backgrounds (among those from semi-skilled and unskilled family backgrounds extended

periods on the margins were twice as common as for those from professional and managerial backgrounds). Sweet also reports high rates of job mobility within marginal activities (i.e. from one part-time job to another).

### ***Fields of employment***

The Australian economy was once dominated by agriculture and mining but these industries now employ less than 10 per cent of the labour force. Burke (1996) documents more recent developments in the labour force as follows. In recent times the share of total employment in manufacturing declined from 24 per cent in 1970 to 14 per cent in 1995. Employment in community services continued to grow through the 1980s as did finance property and business services. In the retail and wholesale trade employment also grew but was made up of part-time employment. Australian Bureau of Statistics data for those aged 20 to 24 years indicate that 27 per cent of employment was in the wholesale or retail trade, 16 per cent was in finance, property or business, 14 per cent was in manufacturing and 8 per cent was in the hospitality industry (Ainley & Fleming, 1997).

### ***Employer perspectives***

It is evident that young people without education and training qualifications do not fare as well in the labour market as those with those qualifications (Keating, 1995). One author concludes that in a highly competitive economy based on smaller sized enterprises; “firms want people who are immediately productive adaptable and can do several tasks” (Keating, 1995: 19). Keating quotes the results of a 1992 survey by the Confederation of Australian Industries that lists the three most important reasons given by employers for a reluctance to employ young people: lack of maturity (86%), low skill levels (83%) and lack of relevant training (76%).

## **School systems**

### ***Government school systems***

School education is the responsibility of the individual states and territories, although the influence of the Federal government has grown in recent times. State education departments recruit and appoint the teachers in government schools, supply buildings, equipment and materials, and provide limited discretionary funding for use by schools. In most states some responsibility for administration, staffing and curriculum has been devolved to regional education offices and schools. Devolution of responsibilities to schools is likely to become more extensive as most states are now moving towards self-managing schools in the government school sector.

### ***Non-Government schools***

Non-government schools are an important feature of the provision of education in 1996 enrolled 29 per cent of students (26 per cent of primary and 34 per cent of secondary school students). Almost all private schools have some religious affiliation, most commonly with the Catholic church (67 per cent of non-government school students are enrolled in Catholic schools). Other non-government schools vary from long-established, prestigious schools to relatively new, fundamentalist and alternative education schools.

Non-government schools are supported by a range of funding sources including government grants. In 1992, 37 per cent of private school income was derived from fees and charges, 7 per cent from private donations and income, 19 per cent from State government grants and 37 per cent from Federal government grants. Government grants were much more important for Catholic schools (72 per cent of income) than other non-government schools (33 per cent of income). The fees levied by private schools range from about A\$400 a year in some parish primary schools to about A\$10 000 in some secondary schools. State and Federal taxation revenues provide almost all the financial resources for the operation of government schools. Although parents are not officially required to pay fees for students to attend government schools, many schools seek voluntary contributions from parents and raise funds from other local sources. In some secondary schools this can amount to 5 per cent of the operating costs of a school.

### *Curricula*

There is no common school curriculum across the country, although almost all students would be exposed to a curriculum that provided coverage of English language arts, mathematics, science, social studies, humanities, the creative and performing arts, physical education and, less frequently, a foreign language. Within states the general pattern is that central authorities specify broad curriculum guidelines and schools have considerable autonomy in deciding curriculum detail, text-books and teaching methodology. This situation applies particularly at primary and junior secondary level. At the senior secondary level (Grades 11 and 12) the curriculum is more likely to be specified in detail by a State authority responsible for examining and certifying student achievement. At this level students generally have more scope to specialise and a range of elective studies is provided.

In recent years a system of national statements and profiles in each of the key learning areas was developed through the Ministerial Council on Education, employment and Training (MCEETYA). Even though the proposal was not formally adopted it has been influential in the various State initiatives. The lack of uniformity of curricula and the certification of achievement results in some problems of recognition of qualifications when people move between states.

### *Age of attendance*

Education is compulsory from ages 6 to 15 years (16 in Tasmania) and between these ages there is virtually 100 per cent attendance at school. Most children start primary school at 5 years of age and a majority of 4 year-olds attend pre-school (kindergarten) on a part-time basis. Primary education lasts for either 6 or 7 years, depending on the State concerned so that students complete that stage of schooling at the age of 11 or 12 years. Almost all government primary schools are coeducational. Attendance at primary schools is almost universal and in 1993 there were 1.8 million primary students.

Secondary education is provided for either 5 or 6 years depending upon the length of primary education in the state. Students normally commence secondary school at about 12 years of age. Most secondary schools are comprehensive; secondary-technical (vocational) schools which previously existed in some states have been phased out. There is a small number of selective-entry secondary schools in some states. Almost all government secondary schools are coeducational, but the majority of non-government secondary schools are single sex.

### ***Participation in postcompulsory schooling***

One of the most marked changes during the 1980s was an increase in the percentage of students who remained beyond the minimum school-leaving age to complete secondary school. The percentage of commencing secondary students remaining to the final year of school rose from 35 per cent in 1980 to 77 per cent in 1993. One of the explanations proposed for the rise in school retention rates was that the availability of full-time jobs for teenagers had declined. However school retention rates continued to rise through the 1980s even when the availability of jobs improved. This is partly explained by the policy initiatives taken by education authorities to improve school completion rates. Since 1993 the holding power of schools has declined so that in 1996 the retention rate to the final year of secondary school was 71 per cent. Since 1976 the secondary school completion rate has been higher for girls than boys and, in 1995, 77 per cent of girls, compared to 66 per cent of boys, remained to the final year of school.

The increase in school completion rates that took place during the 1980s caused some rethinking of the purposes of the senior secondary years. Whereas the senior secondary years of school had previously been oriented to university entrance destinations such as courses of vocational education and training and direct entry employment for high school graduates became important.

### ***Targets for education and training***

An important issue arising from these completion rates is the question of what becomes of those who do not complete secondary school. Targets for participation in postcompulsory education and training were adopted following a report from The Australian Education Council Review Committee (chaired by B. Finn), *Young People's Participation in Post-compulsory Education and Training* (AEC, 1991). The first of these targets specified that by 2001, 95 per cent of 19 year-olds should be participating in Year 12, have completed Year 12, have completed Years 10 or 11 and be participating in some formally recognised education and training, or have completed Years 10 or 11 and some formally recognised education and training. The second set of targets specified that by 2001, 60 per cent of 22 year olds should be participating in education and training programmes which lead to level 3 awards (e.g. a trade certificate), have attained level 3 (or above) qualifications, or be participating in (or have completed) higher education studies such as degrees and diplomas.

## **Vocational education and training**

### ***Provision***

Statutory responsibility for vocational education and training rests with State and Territory governments. Employers and unions are represented on State training authorities and through State Industry Training Boards (ITBs) where they can more specifically influence training arrangements in an industry. A Federal statutory authority, the Australian National Training Authority provides coordination of and support for policy initiatives in the area. At Federal level there are Industry Training Advisory Boards (ITABs) which develop training plans for the industry.

In each State or territory, institutes of technical and further education (TAFE) are the major providers of vocational education and training. However vocational education and training is also provided through private providers (e.g. business colleges), adult and community providers, and increasingly by schools. In 1995 nearly 97 per cent of teaching hours in vocational programmes were provided by TAFE and other government providers (ACVETS, 1996: 11).



### ***Types of programme***

TAFE institutes provide a wide variety of courses including pre-employment programmes, apprenticeships, retraining and updating programmes, para-professional and liberal adult education. TAFE is the most accessible part of the tertiary sector. Participation in TAFE is characterised by part-time attendance and a wide age range among its participants. In 1995 some 228 900 people in the age range 15 to 24 years were enrolled at a TAFE institute: 85 700 on a full-time and 143 200 on a part-time basis (ABS, 1996c). Also in 1995 there were 52 300 students aged 15 to 24 years in other educational institutions such as business colleges and industry skill centres (ie not TAFE, school or university). Despite these numbers there is some concern that a much smaller proportion of young Australians take part in recognised vocational preparation in the immediate post-school years than in other OECD countries (Sweet, 1996). In a later section of this paper data indicate limited growth in participation by young people in vocational education and training.

### ***Apprenticeships and Traineeships***

One of the important traditional components of vocational education and training in Australia has been an apprenticeship system based on a British model. Normally the duration of an apprenticeship is four years during which the apprentice works for an employer (or group of employers under a group training scheme) and attends a training institution (traditionally a TAFE institute) for part of the time. Although there is some variation between industries and states a traditional apprenticeship would typically involve 800 hours attendance at a TAFE institute. Arrangements for this attendance vary between industries and states (e.g. day release or block release). In recent years some features of the apprenticeship system have been argued to be limitations: the extent of regulation, limited flexibility, linkage to traditional occupation, lack of response to modern technology and lack of access to women. In addition they have declined in number since 1990 and have declined more sharply as a proportion of total employment (Sweet, 1996).

In 1985 traineeships were introduced to provide a shorter and more flexible approach to entry-level training. Traineeships usually involve a one year programme (some are two years) with an employer incorporating on-the-job and off-the-job training. Traineeships operate in occupations other than traditional trades such as those in office-based and retail industries. An Australian Vocational Training Scheme was later developed (1992) to integrate apprenticeships and traineeships as part of a more unified entry-level training system. Further changes to the provision of entry-level training are envisaged under the New Apprenticeship scheme.

### ***Level of school attainment before commencing VET***

In principle, entry to many VET courses is possible after Year 10. However, the combination of a tight labour market and rising school retention rates during the 1980s meant that many VET entrants now complete Year 12 at secondary school. In 1995 some 46 per cent of VET students (for whom a school attainment level was known) in vocational streams had completed Year 12 at school (ACVETS, 1996). In 1984 the corresponding figure was 22 per cent having risen from 17 per cent in 1982 (CTEC, 1986). Deferred entry to vocational education and training to a later age than previously has implications for the opportunities available to early school leavers.

## **Higher education**

### ***Organisation***

Prior to 1990 higher education was organised as a binary system and comprised universities and colleges of advanced education (CAEs). Relative to universities the CAEs placed more emphasis on teaching than research. In 1988 there were about 20 universities and 50 CAEs in Australia. In 1990 the formal distinctions between universities and CAEs were removed and a unified national system of universities was instituted. Amalgamations stimulated by the Federal government reduced the number of separate institutions to about 37. It is not clear what effects the reorganisation of higher education has had on the availability of vocational programmes and on teaching. Since the late 1980s several privately funded universities have been established, but high tuition fees have limited enrolments.

### ***Enrolments***

In 1995 total higher education enrolments were 604 000, a rise of 73 per cent since 1983 (DEETYA, 1996a; 1996b). More importantly for this paper, enrolments of commencing students in Bachelor and other undergraduate courses had grown from 100 000 to 173,000: an increase of 73 per cent. Much of this increase was a flow-on from the substantial rise in secondary school completion rates noted earlier. School leavers from one or two years previously made up just over half (52 per cent) of commencing students in undergraduate courses. About 50 per cent of Year 12 graduates enter higher education within a year or two of completing secondary school. It is suggested that 1997 enrolments will show a decline in enrolments but these data are not yet available.

An indication of the size of the university and vocational education and training systems is provided by destinations of school leavers. In 1996 some 28 per cent of school leavers from the previous year commenced at university compared to 24 per cent in vocational education and training (an additional 5 per cent were in other unspecified forms of education - usually short courses).

### ***Entry***

Entry to higher education is normally based on academic results in external examinations or school assessments. Competition is fierce for entry to the more prestigious faculties and institutions. Provisions also exist for entry by people who lack a Year 12 qualification. In 1993 about one in seven commencing undergraduate students was admitted on the basis of prior informal study or work experience. More than half (59 per cent) of higher education enrolments are full-time and around 20 per cent of students are engaged in postgraduate study. Despite the rapid expansion in the university system since the early 1980s, students are still drawn disproportionately from managerial and professional backgrounds.

### ***Costs***

From 1973 to 1992 university students did not pay tuition fees but since 1989 students have paid for a proportion of the costs of tuition through an income contingent loan scheme known as the Higher Education Contribution Scheme (HECS). Under this scheme students can pay a tuition fee either in the form of as part of their taxation obligations when their income reaches a specified level or at the time they enrol. In the first years of operation the tuition fees were uniform across courses but from 1997 the levels

of fees will be differentiated between courses and have been increased somewhat. Since there is no HECS operating in vocational education and training its cost to the individual is lower than that of university.

### *Overseas students*

There has been substantial growth in the numbers of overseas students enrolling in secondary and tertiary educational institutions. Some of these students are brought to Australia under overseas aid programmes but the total number of international students has grown rapidly since 1986, when public institutions were first permitted to enrol them on a fee-paying basis. In 1995 there were 52 000 overseas students (mostly from South-East Asia) enrolled in Australian universities, which represented about 8.6 per cent of total enrolments. Nearly 90 per cent of these overseas students paid full tuition fees.

## 2. THE AGE SPAN OF TRANSITION

The transition from initial education to working life is defined in the OECD planning documents as the period during which young people move from the principal activity being full-time schooling or its equivalent to that in which their principal activity is work.

In Australia the beginning of the transition period can be considered to be 16 years of age. This point can be defined from two perspectives: legislation that defines the minimum school leaving age as 15 years and participation rates showing the percentage of young people in full time education.

The percentages of each age in full-time education in 1995 is shown in Table 1. Those data indicate that almost the full age cohort is in education (school) at the age of 15 years but that by the age of 16 years some 15 per cent of the cohort are not in full-time education. School participation declines to a small percentage by the age of 19 years but participation in full-time education continues to be substantial by until the age of 23 years. By the age of 24 years fewer than 10 per cent of the cohort participate in full-time education. Even though the point that concludes the transition period is less clear than the point at which it commences it seems reasonable to define the transition period as spanning the ages from 16 to 24 years.

**Table 1 Participation Rates in Education for persons Aged 15 to 24 Years: 1995**

Age in Years	15	16	17	18	19	20	21	22	23	24
School	95	83	67	22	3	2	1	0	0	0
All Full-time Education	95	85	74	48	35	33	22	17	11	8
Part-time Education	0	3	5	9	15	11	11	10	11	11

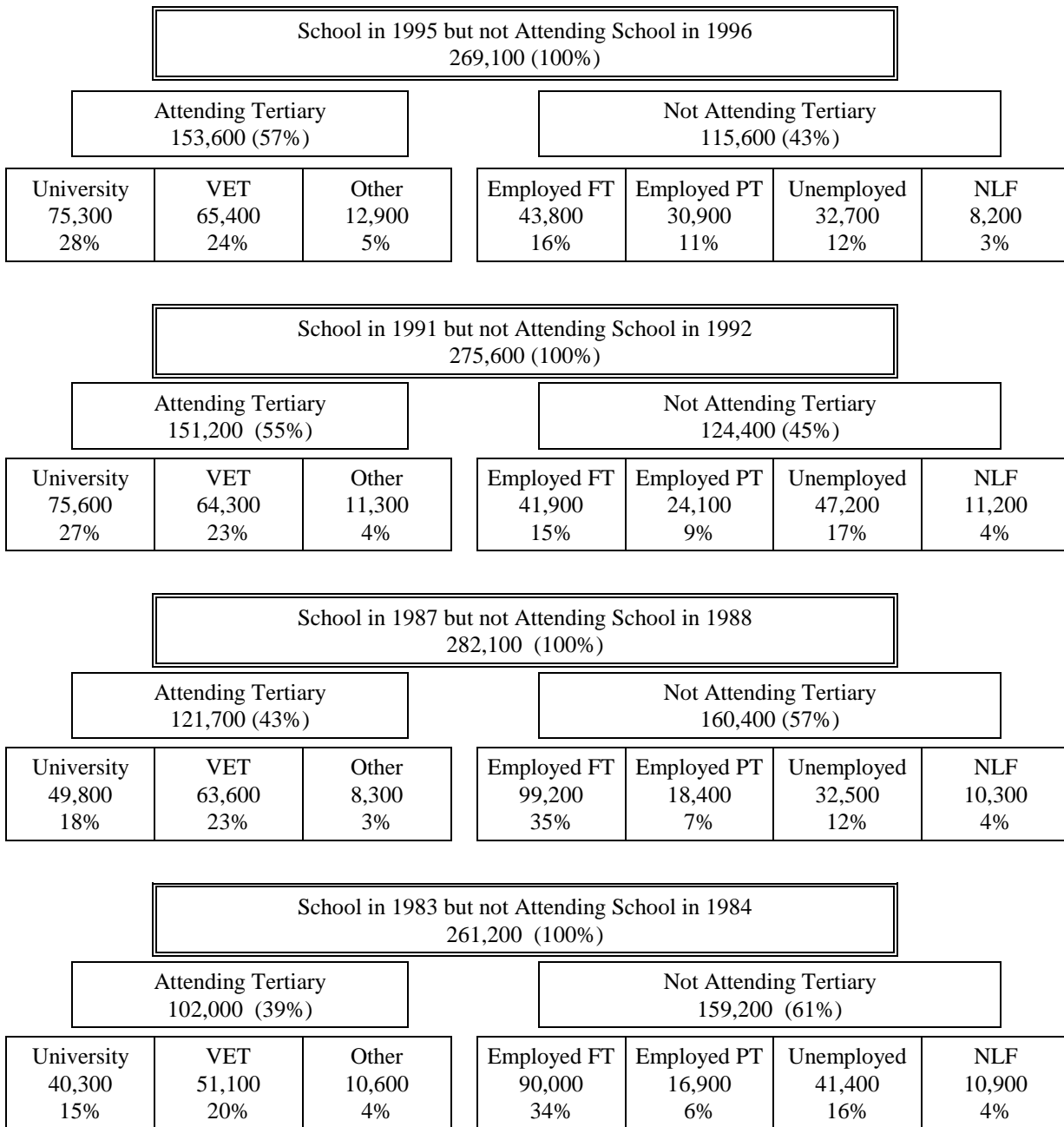
*Source: ABS, Participation in Education 1995 (Cat. No. 6272.0)*

### **3. ISSUES IN TRANSITION PROCESSES AND OUTCOMES**

#### **Education training and work pathways**

Figure 1 documents the study and employment outcomes for four cohorts of school leavers covering the period from 1983 to 1996.

**Figure 1 Study and Employment Outcomes for School Leavers Aged 15 to 24 Years**



Notes: University includes college of advanced education enrolments in years prior to 1992.

VET represents Vocational Education and Training (mainly TAFE)

NLF refers to people not in the labour force.

Source: Australian Bureau of Statistics (various years) Transition From Education to Work. Catalogue No. 6227.0.

The data in Figure 1 are based on information concerning those young people aged 15 to 24 years who attended school in one year (e.g. 1995) and who were not attending school in May of the next year (e.g. 1996).

Figure 1 indicates an increasing percentage of school leavers proceeding to tertiary study over the period from 1984 to 1992 with a flattening of this growth in 1996. This growth was mainly associated with increased university enrolments. However there was a growth in participation in vocational education and training from 1984 to 1988 and if the category "other" is assumed to include short courses in vocational education and training, that sector would also show steady growth.

Among those school leavers who did not continue with study there was a substantial decline in the percentage of school leavers who obtained full-time employment and a steady rise in the percentage who were employed part-time.

The percentage of each group of school leavers who were unemployed in May of the year after leaving school fluctuated over the period and the percentage who were not in the labour force remained fairly constant.

Two policy issues emerge from these observations. The first is what is the appropriate level of provision of university places for Australian society. McGaw (1992) notes that the growth in university enrolments has taken Australia to the point that 40 per cent of any age group will enrol in university at some stage: 28 per cent using the Year 12 entrance score and 12 per cent entering as mature age students. He invites consideration of whether that is the appropriate pattern and whether more thought should be given to its impact on the TAFE option.

The second issue is how to provide for an effective transition from school to work given a dramatic decline in the percentage of school leavers obtaining full time employment. There is a need to consider the pathways through forms of post-secondary education to employment, since for many leaving schools involves further study of some sort.

### **Full-time and part-time study**

The information presented in Figure 1 does not indicate the combinations of further study with work that are involved. In some cases the work is undertaken simply to provide a form of income whilst studying, in other cases it represents an integral part of the course and entry to an occupation and in a number of cases such a distinction is not clear.

Commencing university students tend to be full-time. Among university enrolments the percentage of commencing students who were full-time increased from 57 per cent in 1983 to 65 per cent in 1989 and then declined to 61 per cent in 1995 (DEETYA, 1996). However, young university students (and by inference those who enter within one or two years of leaving school) tend to enrol on a full-time basis. In 1995, 93 per cent of university students aged 19 years or younger were studying full-time (ABS, 1996d: 137).

Among students in TAFE the percentage of students who are full-time is much smaller due mainly to the nature of the courses involved. TAFE courses often involve a compulsory simultaneous work component such as those associated with apprenticeships and traineeships. In 1991, 90 per cent of net enrolments in vocational courses (ie excluding recreational stream 1 000 courses) were part-time (ABS, 1992: 99). Even though, as for university enrolments, younger TAFE students tend more frequently to study on a full-time basis the difference with the university pattern remains. In 1991, 20 per cent of all TAFE students aged

younger than 20 years in vocational streams (2 100 to 4 500) were enrolled on a full-time basis [ABS, 1992: 99 (Cat No. 4224.0)]. Hence many of those who proceed from school to a vocational education and training course (usually TAFE) also enter the labour force before they have left education.

### **Graduating from university or VET**

The Graduate Careers Council of Australia has monitored the destinations of university graduates over many years. As a standard procedure it references employment and education status on 30 April of the year following graduation. In 1995 (ie among those who graduated in 1994) 79 per cent of Bachelor degree graduates available for full-time employment were in full-time employment, 13 per cent were working on a part-time basis only and 12 per cent were not working. This calculation was based on 63 per cent of all bachelor degree graduates. It excluded from the calculation those who had continued in full-time study (22 per cent) and those who were working on a part-time or casual basis (5 per cent) and those who would not be in the labour force because they were overseas or for some other reason (8 per cent). The employment rates for 1995 were the highest for any of the surveys over the 1990s (GCCA, 1996).

In 1995 the Australian Bureau of Statistics surveyed the destinations of graduates of TAFE programmes from the previous year. The reference date was 31 May 1995. In total it reported that 73 per cent of respondents were employed at that time, 15 per cent were unemployed and 12 per cent were not in the labour force. (54 per cent full-time and 19 per cent part-time). The highest percentage of employed graduates was from the advanced certificate (post-trade) and certificate (trade) qualifications (84 per cent) (ABS, 1996e).

Although the employment rates for university and TAFE graduates are high they do not take account of the employment destinations of those who do not complete courses. These data need to be considered in conjunction with information about student progression rates in these sectors.

### **Completing secondary school: changing patterns**

Over the last 20 years Australia experienced large shifts in the levels of school completion and early school leaving. At the beginning of the 1980s only about 30 per cent of secondary school students remained to Year 12, while 1992 saw the rate reach almost 77 per cent. Since the retention rate has fallen annually, dropping to a rate of 72 per cent in 1995 (ABS, 1996f). Much has been written about the substantial growth recorded during the 1980s, but much less is known about the recent downturn. This section examines some features of the recent downturn in school completion, provides a profile of the populations now dropping out of school, and examines some of the initial educational and labour market consequences of early school leaving.

#### ***Trends in school completion***

The 1980s formed an important period in the move towards mass secondary schooling in Australia as school completion rates rose dramatically and schools recruited more widely to the senior secondary years (Williams *et al*, 1993). However, the change in school holding power was not evenly distributed. For males, early school leavers in the early 1990s continued to be drawn more heavily from lower socioeconomic groups (Lamb, 1994). While some gains in school completion were made by these groups during the 1980s, social differences in rates of early leaving remained entrenched (Williams *et al*, 1993). For young women the major gains during the 1980s were made by those from lower socioeconomic status origins and those from an Australian or other English-speaking background (rather than non-English



speaking origin), as well as those attending government schools: those who historically were least likely to complete school (Lamb, 1994).

**Table 2 Apparent Retention Rates to Year 12 by State for Various Years**

	1981	1986	1991	1992	1993	1994	1995	1996
New South Wales	33	44	61	69	71	70	69	68
Victoria	33	47	76	81	79	77	75	75
Queensland	39	58	80	85	83	79	76	76
South Australia	39	55	84	93	86	82	71	68
Western Australia	35	50	71	73	76	73	71	71
Tasmania	27	30	53	60	61	58	60	53
Northern Territory	18	34	57	57	48	43	43	41
ACT	68	78	96	97	94	93	91	91
Australia	35	49	71	77	77	75	72	71

Since 1992 there has been a marked fall in the rates of school retention. The downturn in school retention rates in Australia has also been uneven affecting some populations of school users more than others. Differences in the rates of decline are associated with state, gender, school system, rural or urban residence, and social origin.

All states in Australia experienced falls in apparent retention rates between 1992 and 1995. Relevant rates are shown in Table 2. However, while all states have recorded falls, the downturn has been strongest in South Australia (23 per cent for males and 20 per cent for females), Queensland (11 per cent for males and 8 per cent for females) and the Northern Territory (14 per cent for males and 15 per cent for females). New South Wales, Tasmania, and Western Australia recorded much smaller declines. Some of these differences across states are due to differences in economic conditions, in labour market opportunities, in senior school programme development, in institutional reforms, as well as in populations. The downturn in South Australia has been influenced by changes to senior school certification requirements and changes in the numbers of grade repeating students.

The data in Table 3 indicate that the declines in retention have not affected all school sectors in the same way. Since 1992 Government schools have experienced the largest falls in apparent retention. Nationally, government schools began the 1980s with a low base of retention: 25 per cent for males and 35 per cent for females (compared to 45 per cent for males and 44 per cent for females in Catholic schools, 85 per cent for males and 90 per cent for females in non-Catholic private schools). Even so, it was the government sector that experienced the most rapid growth across the 1980s. By 1992 for males less than 5 percentage points separated Government and Catholic schools, compared to 20 percentage points a decade earlier. The rates for females, where the differences were smaller at the beginning of the period, by 1992 had almost converged (79 per cent in Government schools and 80 per cent in Catholic schools). Since that time retention rates for the government sector have declined causing the gap to increase once again. It would appear that the populations which had the most ground to make up, and historically had made the least use of extended schooling, have been the most vulnerable to the recent pressures influencing the move away from school.

**Table 3 Apparent Retention Rates by Sector for Various Years**

	1981	1986	1991	1992	1993	1994	1995	1996
Government	28	42	67	74	73	71	67	na
Catholic	46	57	72	76	77	76	75	na
Independent	89	91	101	101	98	97	96	na
Total	35	49	71	77	77	75	72	71

There are also social differences in the recent falls in school retention, as measured by occupational background (see Table 4). While school during the 1980s may have proved a source of security for a growing number of boys from unskilled manual occupational backgrounds, it did not do so in the early 1990s. It is this group which has experienced the sharpest downturn in school completion since 1990, with the rate of school completion falling by over 13 percentage points. By comparison the falls in school completion for boys from professional and managerial backgrounds was 3 percentage points. The differences in rates of fall mean that the social gap in completion has increased during the early 1990s.

The trends are slightly different for girls, but it has to be kept in mind that the rates of school completion for girls as a group are substantially higher than for boys (and have been since 1976). This reflects a combination of factors including changes in labour market opportunities and rising aspirations of young women to enter higher education. The falls in rates of school completion have been smaller and more even for girls as a result. Apart from the professional and managerial group, the fall in Year 12 completion was of a similar magnitude across groups: about 5 percentage points. The levels of decline for girls from skilled manual and clerical/ intermediate non-manual backgrounds matched those of their male counterparts. For girls from unskilled manual origins the decline has been about one-third that of their male peers suggesting differences in the pressures, or responses to the pressures, to remain at school or leave. As they have done historically, students from professional and managerial backgrounds continue to make most use of school. Differences in rates of downturn related to living in rural or urban areas and differences related to language-speaking background have been negligible.

**Table 4 Differences in School Completion Rates by Social Group**

	1990/91		1994	
	Males	Females	Males	Females
Professional	91	95	89	95
Intermediate Non-manual	85	91	81	86
Skilled manual	76	85	71	80
Unskilled	72	74	59	69

**Early school leavers in the 1990s**

The rates of early school leaving in the 1990s are strongly related to family educational and cultural resources. Students from families in which the father or mother has a professional occupation and where the parents are university-educated, and therefore more likely to have greater knowledge of the school system and to have higher education aspirations for their children, far less often experience early school leaving (Table 5). For these traditional users of extended postcompulsory schooling, parents' education plays an important role in shaping academic progress. For both sons and daughters, rates of early leaving are much lower where the mother or the father is university-educated.

Conversely, for families in which parents have little formal schooling or the parents are in unskilled manual jobs -- families which are most dependent on school for promoting their children's chances of academic success and social mobility -- there are much higher levels of early school leaving. Among girls, for example, those with parents who are factory workers or in other unskilled manual work have a drop out rate of 29 per cent compared to 9 per cent for those with parents in professional occupations. Early leaving is far more frequent among children from lower socioeconomic backgrounds.

**Table 5 Rates of non-completion of school by various background factors\***

	Males (N=1008)	Females (N=1120)
<u>Father's Birthplace</u>		
English speaking	29	21
Non-English speaking	26	13
<u>Place of Residence</u>		
City	26	16
Rural	31	27
<u>Type of School Attended</u>		
Government	31	24
Catholic	19	10
Independent	9	4
<u>Parent's Occupation</u>		
Prof/Managerial	13	9
Clerical	21	12
Skilled manual	28	19
Non-skilled manual	35	30
<u>Father's Education</u>		
University	9	5
Post-secondary	22	13
Secondary	30	21
<u>Mother's Education</u>		
University	13	10
Post-secondary	18	15
Secondary	31	21

\* Data are from the Australian Youth Survey. Figures are based on a national sample of 19 year-olds in 1995.

Rates of dropping out are also related to where families live and the schools they use. Reflecting a long term pattern, children of families living in rural areas, where schools are usually smaller and less able to offer a comprehensive range of senior school curriculum options, less often than their metropolitan counterparts continue at school to the final year. This is particularly apparent for rural-based girls who have a drop out rate 10 percentage points above that of their city counterparts. Schools serving different groups of families also influenced the rates of dropping out. Young people attending independent schools -- with the benefits these schools provide in terms of selective social intake, high concentrations of physical and teaching resources, and a strong focus on preparation for university entry -- have substantially lower dropout rates. This is true for both boys and girls. Attending a Catholic school offers less advantage: rates in Catholic schools are higher than independent schools. However, they offer some advantage over government schools (13 percentage points in the case of girls and 11 percentage points for boys).

The language-speaking background of families also influences the rates of dropping out. Young people whose fathers are born in non-English speaking countries more often continue at school than those from English-speaking backgrounds. This is more apparent for girls. Those with fathers born in non-English speaking countries have a dropout rate of 13 per cent compared to 21 per cent for girls with fathers born in English-speaking countries. The difference for boys was much smaller; about 3 percentage points. These findings are in line with research which has shown that even though the average educational attainment of parents in non-English speaking families is lower than their English-speaking equivalents, they have higher educational aspirations for their children and place a premium on completing high school as a form of enhancing their children's future prospects (Miller and Volker, 1989).

In the 1990s, then, it is clear that social groups differ in the use they make of school. Some families, mainly those where the parents have little formal schooling and lower status jobs, have much less purchase on postcompulsory schooling. Children from these origins have higher rates of dropping out. Other families, in which parents are well educated and enjoy professional careers (the traditional users of postcompulsory schooling), continue to be successful in promoting high rates of school completion. Their children more often avoid the risks associated with early school leaving.

### ***Initial educational and labour market outcomes***

The numbers of young people dropping out of school fell during the 1980s. With more young people completing Year 12 have the educational and labour market opportunities changed for early leavers? One way to assess this is to compare what happens to those who leave school early with what happens to those who finish Year 12. The comparison presented here is based on the main activity of school leavers during their first year out of secondary school. Main activity refers to what school leavers were doing for the greater part of the year (more than six months), whether they were working, looking for work, studying or doing something else. Table 6 provides a brief comparison of the main activities of Year 12 completers and early school leavers in their first year out of school. Results for the early 1980s and early 1990s are provided.

When comparisons are made between early school leavers and school completers in terms of unemployment, it would appear that in terms of avoiding unemployment there are benefits in completing Year 12 and these benefits have increased over the last decade. In the early 1980s higher proportions of early school leavers than Year 12 graduates were unemployed rather than in further education or in work. While the differences were negligible for teenage boys they were substantial for girls (23 per cent as against 10 per cent).

**Table 6 Main activity of school completers and early school leavers in first post-school year**

Main activity	School completers				Early school leavers			
	Males		Females		Males		Females	
	Early 1980s	Early 1990s	Early 1980s	Early 1990s	Early 1980s	Early 1990s	Early 1980s	Early 1990s
Work	35	27	37	23	79	60	54	41
Unemployment	14	15	10	13	14	28	23	39
Study: Higher Education	41	44	37	49	0	0	0	0
TAFE/VET	8	12	13	13	5	8	17	9
Other	2	2	3	2	1	4	6	11
Number =	(309)	(423)	(380)	(425)	(514)	(388)	(411)	(278)

Over the 1980s the gaps widened. Despite smaller numbers of early leavers competing for jobs, by the early 1990s much higher proportions were unemployed. For teenage boys the proportion almost doubled (from 14 per cent in the early 1980s to 28 per cent in the early 1990s). For girls, the rate jumped to almost match that for girls in work (from 23 per cent in the early 1980s to 39 per cent in the early 1990s). By comparison the proportions of Year 12 school leavers unemployed increased only marginally.

Employment is the major activity of Year 12 school leavers who do not enter further education. It involved 35 per cent of male Year 12 leavers in the early 1980s and 37 per cent of females. But over the decade the numbers entering work declined. This was true of both school completers and early school leavers. For early school leavers this was accompanied by sharp rises in unemployment. For school completers it was associated with increases in the numbers entering further education.

The types of jobs gained by school leavers provide another indication of the importance of Year 12. Table 7 shows that there are differences in the types of work early leavers enter compared to school completers, but these differences narrowed over the decade.

In the early 1980s Year 12 completers in their first post-school year were more often employed in technical areas and in white collar jobs such as clerical work, and sales and related work. White collar employment (sales and clerical) remained the most important source of employment for teenage girls into the 1990s. However, for male Year 12 school leavers jobs in trades and semi-skilled areas became more important. In recent years more and more teenage males -- school completers and early leavers alike -- have been taking up low skilled jobs such as factory hand, driver, cleaner and plant operator. The advantages of completing Year 12 for teenage males have become less apparent over the decade with more and more entering similar types of employment taken up by early school leavers, at least during the first year out of school. Further comparisons looking at the jobs held several years out of school will be needed to assess more fully the labour market advantages of completing Year 12.

**Table 7 Jobs held by Year 12 completers and early school leavers in first post-school year**

Type of work	School completers				Early school leavers			
	Males		Females		Males		Females	
	Early 1980s	Early 1990s	Early 1980s	Early 1990s	Early 1980s	Early 1990s	Early 1980s	Early 1990s
Apprenticeship	21	27	4	3	47	46	8	16
Technical/Professional	23	7	16	2	5	2	5	1
Clerical	20	4	31	26	7	5	23	21
Sales & related	24	30	41	55	10	7	50	48
Plant operator	4	7	2	1	7	3	7	4
Labourer	8	26	6	13	25	38	7	10

A major benefit of Year 12 is the access it provides to higher education and other types of further study. The proportions taking up the option of further study have increased over the last ten years, at least in terms of the initial post-school activities of school leavers. The proportion of Year 12 school leavers entering some form of further education increased substantially for both males (7 per cent) and females (12 per cent). The large increase for young women was due to the growth in numbers entering higher education. Female students are now much more likely to go on to university than are their male counterparts. For early school leavers the proportions entering further education full-time increased marginally for males during the 1980s but fell substantially for females.

### School students and part-time work

Part-time work by school students is significant in a small group of OECD countries: the United States, Canada, the United Kingdom, Denmark and Australia (OECD, 1990). In Australia in 1989 nearly one-quarter (24 per cent) of Australian 14-year-old students were engaged in part-time paid employment (Robinson & Long, 1992: 15). Participation in part-time employment was slightly higher for males (28 per cent) than females (21 per cent) at the age of 14 years. More recent analyses, as this cohort has moved through school, show that overall participation in part-time work had risen to 35 per cent of 17 year-olds and the relative position of males and females had reversed (31 per cent of males compared to 41 per cent of females) (Robinson, 1996). On average students who were engaged in part-time work worked for eight to nine hours per week.

These data are broadly consistent with those compiled by the Australian Bureau of Statistics (ABS, 1990). The ABS data also indicated that participation in part-time work increases from 23 per cent at the age of 15 years, through 31 per cent at 16 years to 32 per cent at age 17. The jobs most commonly held by school students in 1989 included sales (34 per cent), delivery people and attendants (15 per cent), factory and trade work (10 per cent) and cleaning (6 per cent) (Robinson & Long, 1992: 19). Analyses of the *Youth in Transition* data also indicated that students with part-time jobs had average (in reading) or slightly above average (mathematics) levels of school achievement. However, the pattern was different for girls than for boys. Whereas girls with part-time jobs had higher than average levels of achievement, boys with part-time jobs tended to have lower levels of achievement.

It has been suggested that part-time work has positive effects on labour market outcomes but there is little systematic evidence to support this at present. If there are positive effects of part-time work on subsequent

labour market outcomes it could indicate students learn something about the world of work through part-time employment. However, it is hard to envisage how schools might build on that learning. It seems that in many cases the experience would be unstructured with relatively little training involved (although some employers of students on part-time basis have quite extensive training programmes) and not linked to what students do in school. The possibility of better structural relationships between part-time work and schooling was raised by Coventry *et al* (1984) but there are few practical examples of initiatives in this area. Karmel (1984) argued for a training scheme outside the formal apprenticeship or traineeship system, involving part-time work and part-time formal school study but with links between the two, for students continuing through secondary school but not intending to proceed to university. Possibly schools could consider what students do in regular part-time work when they plan programmes of work experience for their students and consider ways in which programmes directed to learning about work can incorporate some of those learnings for other students. Others have suggested attending to timetable arrangements and curriculum to better integrate work and schooling and to utilise the experience resource provided by part-time work (Wilson *et al*, 1987).

## **Vocational education and training**

### ***Development***

The first formal development of a national system of training occurred in 1974 with the release of the report of the Australian Committee of Technical and Further Education which led to the establishment of the Technical and Further Education Commission and the concept of a national TAFE system. Prior to this each State and Territory administered their respective training systems through schools, senior technical institutes and apprenticeship commissions. Each State did this in a period of post war prosperity which was characterised up to the early 1970s by low levels of youth unemployment (less than 4.5 per cent for 15 to 19 year olds), low levels of secondary school completion (30.6 per cent for 1971), and high levels of labour force participation (55 per cent to 60 per cent for 15 to 19 year olds).

Alongside the emergent TAFE system during the 1970s and 1980s were Federal and State agencies with particular responsibilities for industrial and labour market training. At the Federal level this was reflected by a National Training Council and a Department of Employment and Industrial Relations with a clear separation of Ministerial responsibility between education and labour market portfolios. This separation was also evident at the State level where Industrial Training or Apprenticeship Commissions operated within departments of employment, labour or industrial relations which were administratively separate from departments of education responsible for TAFE.

The drive to establish a national system of training came from three issues of the 1970s.

- A concern about the adequacy of the structure of skills and skills training within Australia to meet the then perceived challenges of internationally competitive markets and of emerging new technologies;
- A growing awareness about rising levels of poverty in Australia and the possible impact of education in providing access to jobs and income; and
- An awareness that in international terms the Australian provision for school completion or further education other than university was well below that of other developed countries.

During the later 1970s and early 1980s sustained increases in youth unemployment triggered further demands for a national coordinated approach to youth employment and training. The Report of the Committee of Inquiry into Labour Market Programs in 1985 with its recommendations concerning the establishment of traineeships for youth was the first major attempt at structural reform of the youth training field since 1975.

With the establishment of a fledgling national system of training in 1975 the Federal Government undertook the national strategic planning function which it promoted to the States via its commitment to fund the capital development of TAFE Colleges along designated pathways. For their part the States were obliged to maintain the recurrent costs of their respective TAFE systems.

Since 1974 there has been an ongoing commitment by the States to the development of a national training system coordinated by the Federal Government of the day, however, the implementation of national strategies continues to be subject to negotiation between the respective State and Territory Governments and the Federal Government. Today the Federal Government continues its role as the developer of strategic planning for a national Vocational and Education Training system (the TAFE system of the 1970s and 1980s became the VET system of the 1990s in response to a more widely defined brief, see Dawkins 1988) through the Australian National Training Authority (ANTA) and to a lesser extent the Department of Employment, Education, Training and Youth Affairs. It also continues to provide capital funding to States for the maintenance and development of delivery systems as well as providing targeted recurrent funds for designated programmes.

The major negotiating forums for VET policy development are the meetings of Ministers of Education through the Ministerial Council of Education, Employment, Training and Youth Affairs (MCEETYA) and ANTA/MINCO. These Ministerial Councils of 1997 embody the shift over the last ten years of Federal Government and most State Governments combining education and industrial training agencies into integrated portfolios with an essentially education/training focus. The Federal Government through the Commonwealth Grants Commission recurrent grants to States also influences the level of funding and expenditure by them on education and training.

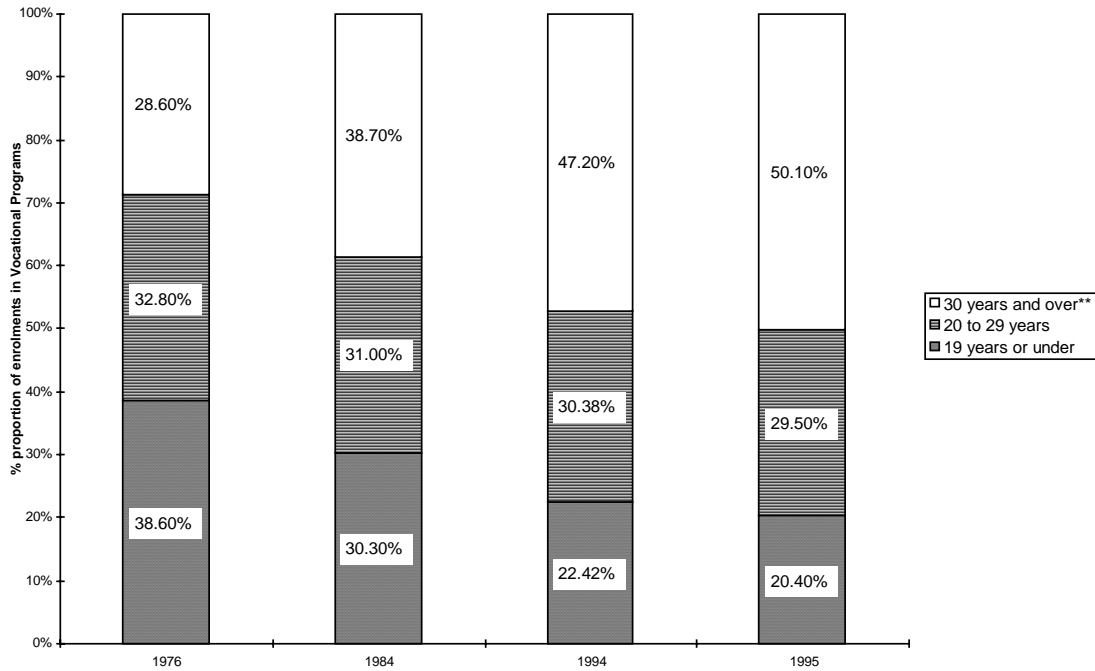
### ***Student Characteristics***

The 15 to 19 and the 20 to 24 year old age groups for the period 1992 to 1995 are declining relative to the rest of the Australian population with the 15 to 19 year grouping also declining absolutely from 1 325 million in 1992 to 1 268 million in 1995. The proportional decline of the 15 to 19 year old group in the population is reflected in the changing age distribution of TAFE/VET enrolments as indicated in Figure 2.

This decline in representation of 15 to 19 year olds in TAFE/VET enrolments from 38 per cent in 1976 to 20 per cent in 1995 can be partly explained by demographic factors but also by a preference from youth and parents to attend university. This decline in the representation of youth in the VET profile occurred when total enrolments/clients over the same period increased from 546 410 in 1976 to 1 272 748 in 1995 (see Table 8).



**Figure 2 Percentage age distribution in vocational programmes in TAFE/VET: 1976, 1984, 1988 and 1995**



The extent of inclusion of the transition age groups within the Australian VET sector varies between the States and Territories. (Figure 3). This variation is attributable to State level historic factors such as the geographic distribution and availability of higher education places (Victoria) and policy factors with regard to VET provision within schools and the age/grade structures in schools (Queensland). Any consideration of national level of inclusion of this age group should therefore pay some attention to the reasons for State by State variations.

**Table 8 Summary of age and gender characteristics of students in vocational programmes or streams in VET/TAFE. Australia. 1976, 1984, 1994, 1995**

	1976 (a)	1984 (a)	1994 (b)	1995 (c)
Clients/ students in vocational programmes.*	546,400	831,200	1,117,900	1,272,700
<u>Age distribution</u>				
19 years or under	210,900	251,800	250,600	259,600
20 to 29 years	179,200	257,700	339,700	375,500
30 years and over**	156,300	321,700	527,600	637,600
Number of females	192,300	376,500	500,800	587,900

\* Due to a series of progressive changes in the collection and definition of VET data from 1974 to the present this composite table should be treated as indicative.

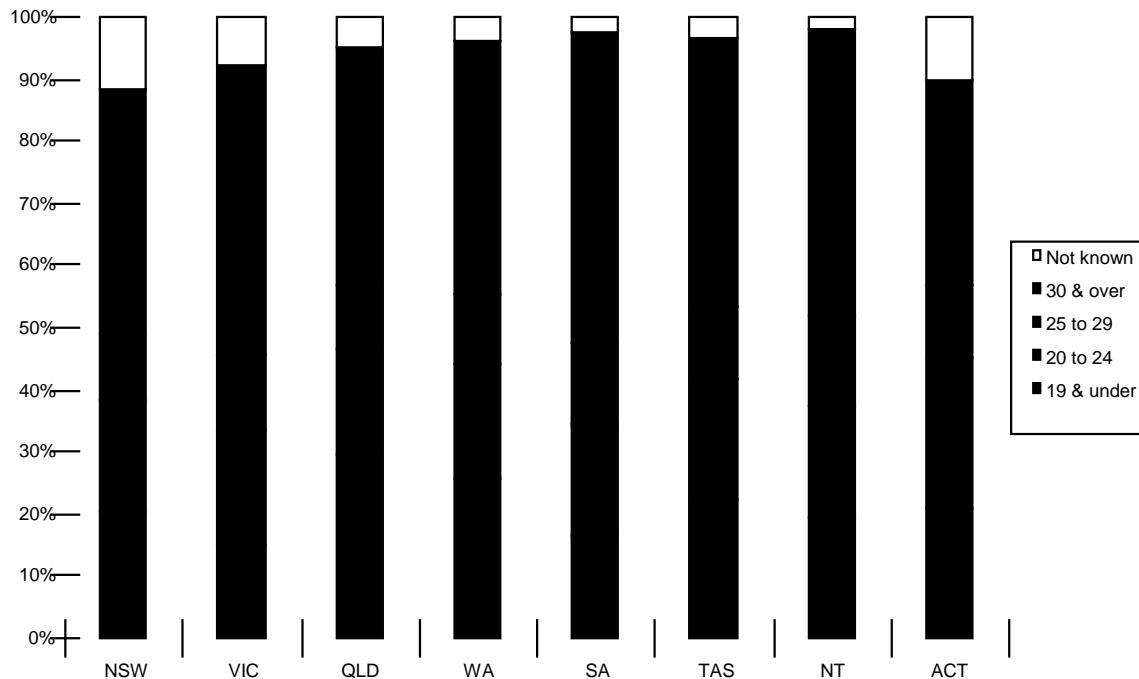
\*\* includes those with unstated age

(a) Review of TAFE Funding, Commonwealth Tertiary Education Commission, Australian Government Publishing Service, Canberra, 1986.

(b) Selected Vocational Education and Training Statistics 1994. Australian Committee on Vocational Education and Training Statistics, NCVER, South Australia. 1995

(c) Selected Vocational Education and Training Statistics 1995. Australian Committee on Vocational Education and Training Statistics ,NCVER, South Australia. 1996

**Figure 3 Proportionate age distribution of State and Territory clients in vocational education: 1995**

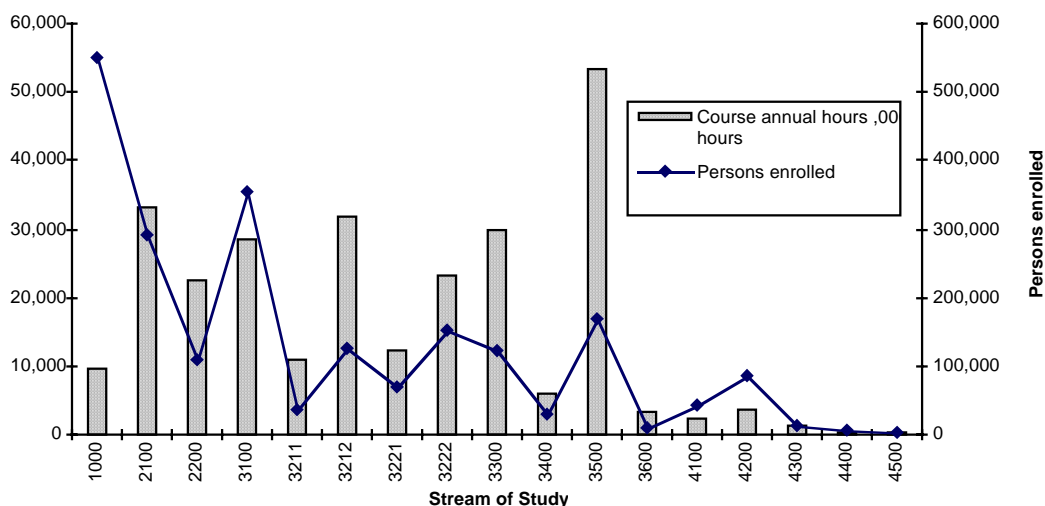


### *Course Profiles*

The provision of VET in Australia is recorded on a Stream and Field of Study basis using both enrolments and Course Annual Hours. Enrolments/clients are an indicator of participation of persons within VET whereas Course Annual Hours are an indicator of effort or resource consumption. It is necessary to distinguish between these two measures because enrolment numbers within a year do not necessarily reflect the annual resource load for a field or stream of study. For example in Stream 1000 courses (recreation, leisure and personal enrichment) the courses are typically of short duration with limited contact hours. This results in a relatively high annual level of enrolments but a low level of generated course hours within a year. The relationship between course hours and enrolments for each stream of VET study is shown in Figure 4.

For 1995 the para professional stream of courses for Higher Technician skills (Stream 3500) generated the most course hours within the VET system (53 378 000 hours with 169 477 enrolments), followed by Basic Employment Skills courses (33 264 000 hours and 291 024 enrolments) and Trade Technician/Supervisory type courses (29 730 000 hours and 123 973 enrolments). On an enrolment basis the three most highly ranked Streams of Study were Recreation, Leisure and Personal Enrichment (551 732 enrolments and 9 628 000 hours), Initial Operatives courses (355 975 enrolments and 28 367 000 hours) and Basic Employment Skills Courses (291 024 enrolments and 33 264 000 hours).

**Figure 4 VET course enrolments and annual hours by stream of study: 1996**



Stream

1000 Recreation, leisure & personal enrichment

2100 Basic employment skills

2200 Educational preparation

3100 Operatives: initial

3211 Recognised trades: part exemption

3212 Recognised trades: complete

3221 Other skills: part exempt

3222 Other skills: complete

3300 Trade technician/supervisory

3400 Para professional technician

3500 Para professional higher technician

3600 Professional

4100 Operatives: post initial

4200 Trades/other skills: post initial

4300 Trade technician/supervisor: post initial

4400 Para professional technician: post initial

4500 Para professional higher technician: post initial

By itself the Para Professional Higher Technician Stream generated some 20 per cent of the 1995 annual hours load of all the vocational streams in VET. The combined technician initial training streams (streams 3300, 3400 and 3500) account for approximately 40 per cent of the 1995 annual vocational course hours load. Initial apprentice training streams (3211 and 3212) accounts for a further 16 per cent of vocational course load. When considered together the initial training for technician and apprentice streams accounts for 50 per cent of all VET vocational course hours for 1995. Initial basic employment skills training and education preparation programmes (2100 and 2200) account for a further 21 per cent of VET vocational course hours. The participation of the youth in transition age groups (15 to 24) amongst these programmes could not be derived from the published data.

The participation of females in VET in vocational programmes for 1995 was 46 per cent. Females comprise 42 per cent of those aged 19 years of age and under in vocational courses and 43 per cent of those aged 20 to 24 years. This general under-representation of young females is not consistent across the vocational streams. In the para-professional higher technician stream females make up 50 per cent of the enrolments but only 12 per cent of enrolments in the entry level trade streams (3211 and 3212). Females predominate in the basic skills and educational preparation streams (53 per cent) and the initial training for operatives stream (55 per cent) but are in a minority in the post initial training stream for the trades (26 per cent). Overall this suggests that little progress has been made in encouraging the entry of young females into training for traditional male occupational areas.

## 4. POLICY AND ORGANISATIONAL CHANGES

### **Vocational education and training**

Many of the major changes evident in the VET system today can be traced back to the Report of the Committee of Inquiry into Labour Market Programs of 1985, referred to as the Kirby Report (Australia, 1985). This inquiry was a response to:

- rising levels of youth unemployment;
- low school retention rates;
- the inflexibility of traditional apprentice and other training systems to youth and employer needs, and
- the lack of coordination between various government agencies with regard to an integrated national training system.

Amongst other things this inquiry recommended:

- that a National Council for Training and Employment be established;
- the establishment of new training arrangements for 16 and 17 year olds to combine part time employment and part time formal off the job training to be known as traineeships, and for this traineeship programme to lie alongside existing apprenticeship arrangements; and
- improved coordination and integration of labour market policy and training programmes occurs.

### ***Traineeships***

The creation of Traineeships and the Australian Traineeship System from this report represented the first structural change to the industrial training systems since at least 1945. For the first time credentialled training for youth, which usually included a 12 month contract of training and a training wage, was created for occupations and industries which lay outside the traditional apprenticeship spectrum. Traineeships in retailing and the transport and storage industry were typical. Other traineeships in areas such as engineering would be later used to build linkages of entry into traditional apprenticeship areas.

The growth of traineeships since 1985 is shown in Table 9 together with numbers of apprenticeships (including commencing apprenticeships). One important feature of the data in Table 9 is its indication of the magnitude of apprenticeship numbers at approximately 40 000 entrants per year and the extent of the fluctuations in those numbers). The same data are represented graphically in Figure 5.

The take up of Traineeships was initially slow with just on 7 000 traineeships being undertaken nationally in the second year of the programme. The next practical push to this concept came from the 1992 report of the Employment and Skills Formation Council of the National Board of Employment, Education and Training which established the Australian Vocational Certificate Training System (AVCTS).

**Table 9 Persons Undertaking a Contract of Training: 1975 to 1996.**

Year	Traineeship commencements	Apprenticeship commencements	Apprenticeships in training
1975/76		38,951	134,675
1976/77		38,680	123,200
1977/78		45,282	126,923
1978/79		42,594	129,908
1979/80		46,395	136,664
1980/81		48,790	140,786
1981/82		47,849	147,170
1982/83		34,794	138,843
1983/84		37,995	131,915
1984/85		49,348	128,580
1985/86	1,093	51,757	130,401
1986/87	7,151	52,082	138,914
1987/88	10,373	55,001	147,110
1988/89	13,659	62,678	151,736
1989/90	13,247	62,259	160,989
1990/91	9,443	44,985	150,989
1991/92	9,216	40,500	142,939
1992/93	16,708	46,090	122,673
1993/94	15,093	50,453	123,258
1994/95(b)	16,800	50,436	122,948
1995/96 (b)	36,750		

Sources (a) Australian National Training Authority. Unpublished papers  
(b) NETTFORCE Update, November 1996

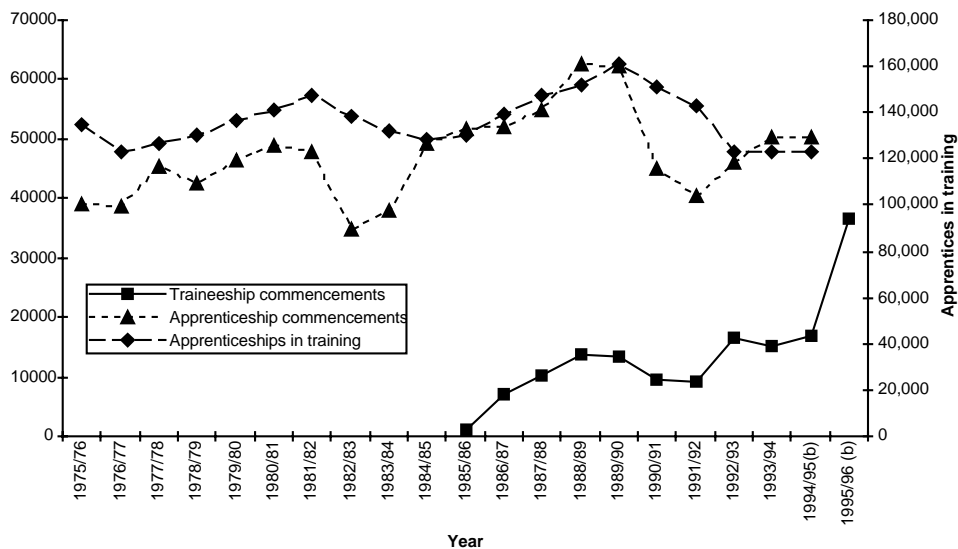
The AVCTS promoted the linked notions of skill formation through the adoption of competency based training and industry derived skill frameworks. In adopting the recommendations of this report States received major seed funds to trial pilot training programmes for youth at the school/work interface and within enterprises. The pilot activities of the AVCTS during 1993 and 1994 made extensive use and further refinement of the Traineeship concept as both a means of structurally adjusting training markets to the needs of industry and meeting the needs of early school leaving youth. The impact of the AVCTS on Traineeships shifted the annual commencement figures from 9 216 for 1991/92 to 16 708 in 1992/93.

A further boost to the Traineeships came in the latter part of 1994 and into 1995 through a number of initiatives of the Commonwealth government and its agencies. These initiatives included simplification of administration and accreditation, promotion campaigns, encouraging industry training companies and generally securing industry commitment to entry-level training.

The traditional apprenticeship form of mixed work and training for youth peaked in 1988/89 and 1989/90 with approximately 62 000 apprentice commencements in each of these years. In spite of this spasmodic

increase in commencement numbers the overall number of apprentices in training fell from a high point of 160 989 in 1989/90 to levels in the 1993 to 1995 period which were consistently below those of the preceding 10 years. It is this stagnation in growth of apprentice numbers which has drawn attention to the rigidity of its structural arrangements (Sweet, 1996).

**Figure 5 Apprenticeship and traineeships in Australia: 1975 to 1996**



Concern has also been expressed about a possible decline in the relative prior school achievement levels of those entering apprenticeships, although this is in need of a more extended investigation (Sweet, 1996).

***Group Training Schemes and the Provision of Apprenticeships and Traineeships***

An important response in terms of policy and practice has been the emergence of group training schemes. Under these schemes the provision of training is organised through groups of firms (sometimes based around associations of employers) rather than through individual employers (ANTA, 1997). Group training schemes emerged through the 1980s in response to two issues:

- concern about the range of skills that could be provided by small companies to traditionally indentured apprentices as subcontracting encouraged these enterprises into specialisations; and
- the need to increase the involvement of smaller enterprises in apprentice training.

These two issues were managed by the formation of companies that became the primary employer of apprentices and then recruited small employers to take on apprentices on a fractional basis related to the production cycle. The rotation of apprentices between these employers became the responsibility of the Group Training Company. Enterprises receiving apprentices paid the Group Training Company a fee based on wage costs. The Group Training Company as the primary employer could receive various forms of financial support from State and Federal Governments.

During 1986 Group Training Companies began to include Trainees and provide a range of other employment, training and business services. Group Training Companies have played an important role in periods of economic downturn by employing “out of trade” apprentices discarded by their original employer.

The Australian Bureau of Statistics report that during the period 1990 to 1994 whilst there was a 23 per cent decline in the numbers of apprentices across Australia the number of Group Training apprentices increased by 28 per cent (ABS, 1996d). Access and equity principles are also a key part of the Group Training Company through which employment was available to youth who might not otherwise have secured an apprenticeship (eg. during the 1980s Group Training Companies were leaders in employing girls in traditionally male domains).

In June 1996, 127 Group Training Companies were the primary employers for 21 000 apprentices and trainees throughout Australia. (ANTA 1997) The significance of Group Training Companies as a major provider of employment and training for youth is further emphasised in the profile accorded them by the Federal Government in its *Training for Real Jobs* policy statement. The Australian National Training Authority is conducting a review of funding and operations of Group Training Companies and has published a discussion paper on the topic. (ANTA, 1997).

### ***Labour Market Programmes***

Until 1996 the Federal Government maintained programmes designed to provide assisted entry into the labour force for those either unemployed or at risk of unemployment. Youth participation tended to be concentrated in the integrated training and off-the-job training components of this programme array. These programmes often required structured training which was provided on a fee for service basis mainly by traditional VET providers such as TAFE Institutes. During the financial year 1994/95 some 522 979 clients participated in these programmes. The distribution of clients across the range of programmes are identified in Table 10.



**Table 10 Commencements in Labour Market Programmes, Australia: 1994/95**

Programme Description	Total number in programme
SkillShare	139,562
JobStart	95,212
JobTrain	90,519
Special Intervention	69,958
Job Clubs	44,817
JobSkills	20,456
Landcare & Environment Programme	14,930
Mobility Assistance Scheme	13,667
New Work Opportunities	10,868
National Training Wage	7,953
Accredited Training for Youth	4,692
Community Activity Programme	998
Other	9,347
<b>Total</b>	<b>522,979</b>

The new Federal Government in 1996 reviewed and reoriented the provision of labour market programmes for the long term unemployed and those at risk. The changes introduced were intended to improve the quality of assistance to unemployed people, achieve more sustainable employment outcomes, and address structural weaknesses in the current arrangements for labour market assistance. Three key sets of changes have been identified as part of the reform framework for these programmes:

- changes to the delivery of Commonwealth services to jobseekers, by integrating key functions performed by the separate Commonwealth Employment Service and Department of Social Security networks into a single national network of offices;
- the development of a fully contestable market for publicly-funded employment placement services, in which assistance will be provided by a diverse group of employment placement enterprises including private firms, community organisations and a corporatised public provider; and
- new arrangements for the delivery of assistance to jobseekers, including new and more flexible forms of assistance, new approaches to the targeting of that assistance, and significant reforms to payment and incentive arrangements.

It is proposed to establish a new statutory authority as the key point of public contact for people seeking access to Commonwealth services. This new agency will play a key role in receiving clients, determining eligibility for entitlements, assistance and services, and completing the service either directly on its own account or by referral. It will manage a national network of service outlets (and related electronic/teleservice centres) operating under a system of service agreements with relevant Commonwealth policy Departments. Service delivery is proposed to initially focus on income support, student assistance and employment services. Changes to youth support whilst in training have recently been announced.

The shift in the nature and philosophy of labour market support by the present Government is reflected in changes in actual and proposed expenditures. For the period 1995/96 to 1996/97 it is proposed to increase funding for vocational and industry training from \$264.1 million to \$333.1 million whilst funding for Labour Market Assistance to Job Seekers over the same period will fall from \$2 090.1 million to \$1 504.6 million. A number of features of this labour market support strategy are now under development

and in the future should be evaluated in conjunction with other initiatives directed towards encouraging employer participation in training such as those associated with new wage and contract arrangements for New Apprenticeships.

***The Modern Australian Apprenticeship and Traineeship System  
(now known as New Apprenticeships).***

The election of a new Federal Government in February 1996 introduced the Modern Australian Apprenticeship and Traineeship System (MAATS). In August 1996 the responsible Federal Minister issued a key statement explaining this initiative (Kemp 1996). Within this statement the Minister identified important contextual issues for the reform of training such as:

- the need for MAATS to reflect and strengthen enterprise based training;
- the neglect of the traditional apprentice system in meeting the emergent skill needs of small to medium enterprises;
- the complexity and cost in the provision of off the job training by traditional training providers to enterprises;
- the decline in apprentice numbers and the industrial control of the apprenticeship concept which prevented its application to emerging occupations in areas such as the new communications technologies; and
- the role of State Governments in the administration of training systems.

From these background issues the Federal Minister identified a set of key principles for MAATS. These were:

- that it should be an industry led system where training standards are directly related to employer needs and employers can be encouraged to participate more directly in the provision of training;
- streamlined regulation of training in order to make it attractive for employers to engage in more training;
- expanded training opportunities for young people into traditional and new industry and occupational areas building upon the concept of apprenticeship;
- to establish a regional and community focus in the training system which can link the training needs of small and medium enterprises to structured jobs for youth;
- that it should build upon existing work in the area of competency based training to further develop a national training framework; and
- that access and equity principles shall apply with particular reference to literacy and numeracy strategies, women, opportunities for training in regional and remote Australia and unemployed youth.

The proposal for MAATS is that it will deliver:

- new types of apprenticeships for existing and emerging industries as well as updating apprenticeships in traditional areas;
- school based apprenticeships for young people, particularly those not going on to full time university or TAFE;
- more multiple work place apprenticeships and traineeships through Group Training Companies;
- more flexible mixes of training and work with appropriate wage structures via changes to the Workplace Relations Act and the introduction of Australian Workplace Agreements and Certified Agreements;
- income support to apprentices and trainees in new training/work arrangements under the above Agreements to ensure wages are up to National Training Wage levels;
- integration with the expanded Jobs Pathway Guarantee Programme which will enable brokers to provide a range of employment related services to school leavers;
- a user choice framework for the allocation of off the job training funds so that apprentices and trainees will be able to select their programme and programme deliverer; and
- training packages within a national quality assurance framework which will better meet the needs of employers while at the same time providing a nationally portable qualification.

This new Federal initiative is currently being negotiated and developed by a series of Federal/State cooperative committees operating largely under the aegis of either ANTA or MCEETYA. The MAATS policy, like the Kirby Report, seeks to structurally reform the provision of training for youth by:

- blurring the traditional separation between school and work;
- creating new and more flexible forms of training and training wages; and
- allowing industry to have a greater influence on the mix of skill required for particular occupations.

The most significant change to have occurred since February 1996, which will have far-reaching implications for new mixed modes of work and training for youth, is the passing of the Workplace Relations Act by the Federal Parliament in November 1996. This Act will assist the MAATS concept through its provision for Certified Agreements, Australian Workplace Agreements and Approving Authorities to allow training contracts between employers and youth. These Agreements (from July 1997) will enable varied duration training to occur with wages linked to productive time. The full impact on employers and State Training Authorities of this industrial legislation with regard to the provision of training and training places remains to be seen.

Other significant changes to occur in the VET system since 1985 include the establishment of the National Board of Employment, Education and Training in 1988 and its demise in 1996, the tabling of the Deveson

Report of 1990, the Finn Review of 1991 and the establishment of ANTA 1992 with its growing attendant structures.

The environment for the VET system in Australia in terms of the near past (from 1990), the present and the near future (to 1998/99) is characterised by change, which in turn appears to be driven by a sensitivity towards market forces with regard to issues concerning efficiency, effectiveness and quality. The profile agreement process between ANTA and the States and Territories and the attendant access to Growth Funds illustrates this shift. Within this environment of change there appears to be some key issues which will require further attention by VET authorities. Some of these are:

- the inclusion within the VET information and allocation systems of the growing school/industry partnership movement in the provision of accredited VET modules and qualifications;
- how to engage enterprises in effective training partnerships which will allow greater access of training providers to state of the art equipment, processes and systems,
- evaluating the capacity of employers to expand their capacity to engage in cooperative structured work place programmes without substituting these places for what would otherwise have been wage-based part time jobs;
- the capability of what are at present essentially educational authorities in developing policies, programmes and procedures which integrate employment activities and outcomes for youth;
- the extent to which a Federal Government can maintain leadership for the reform of training systems (and in particular for the youth entry component) when States traditionally have controlled ground level implementation, and employers ultimately control the flow of youth into jobs or structured work placements; and
- the linking of training policy to employment and industry policy. Recommendations from recently released advice on tariff and protection policies for the automotive and textile, clothing and footwear industries if carried through will have significant impacts through the likely reduction of employment and training places.

### **Vocational programmes in general secondary schools**

One influence of general secondary schools on the transition to work is through the inclusion of vocationally-oriented elements in its programme. In Australia, increases in school participation rates and continuing high levels of youth unemployment have caused attention to be given to issues of the relevance of senior secondary school studies for those who do not proceed to university (McKenzie & Alford, 1991) and to the provision of programmes within secondary schools which might be seen to be vocationally-orientated and to be integrating vocational learning with accredited school courses (Kennedy *et al.*, 1993; Russell, 1993; Curriculum Corporation, 1994; Golding, 1995). There has been evidence of students choosing more vocationally-oriented subjects in larger numbers than previously (Ainley *et al.*, 1994).

Vocational education in secondary schools has often been criticised as a form of streaming which has undesirable outcomes such as the curtailment of opportunities (e.g. for a US critique see Oakes, 1985). However, an important review of research on the transition from school to work concluded that the streaming implications of vocational programmes in school were complex and not necessarily negative

(Rosenbaum, 1996). With the growth of what has been called the “new vocationalism” there has been increased attention to the ways in which vocational elements are included in secondary school programmes (Grubb, 1996). It is argued that the provision of vocational elements in school programmes should be seen as involving dimensions of both content and pedagogy. In terms of content, it is possible to envisage programmes as involving both academic and vocational elements as well as each separately and its pedagogy could be seen as incorporating a mix of teaching skills or teaching meaning in each. It is argued as mistaken to see a direct association between a particular form of pedagogy and a specific element on the content dimension.

One approach suggested in Australia as a means of characterising the ways in which vocational programmes are included in general secondary schools has been based on three models: the dual model, the unitary model and the integrated model (Schools Council, 1994).

- Under the dual model, students choose between an academic programme leading to university study or an explicitly vocational programme with non-university destinations and approaches to curriculum and pedagogy usually differ between the tracks. It assumes that better learning outcomes result from appropriate placement but in most systems that approximate the dual model the majority of students choose an academic track. The dual model may be implemented within general secondary schools (e.g. the Advanced Levels and the General National Vocational Qualifications of England and Wales represent elements of a dual model as would the tracks in a United States high school) or between general secondary schools and other institutions (e.g. New South Wales). The dual model may also be modified when elements carry dual recognition for each form of certificate.
- The unitary model provides one pathway and one form of credential that incorporates academic and vocational studies (e.g. Victoria). In this model the boundaries between academic and vocational studies in terms of organisation, curriculum and pedagogy are less marked than in the dual model but it becomes rather complex.
- The integrated model (proposed by Young, 1993a) extends the emphasis of the unitary model on the convergence of general and vocational studies. It retains a single certificate underpinned by a small group of core studies shared by all students in combination with “a system of theoretical and applied modules which integrate vocational with general learning”. Vocational studies are organised into flexible but coherent combinations which have meaning in the labour market and further education. These combinations then constitute pathways between school and the world of work or further education. This model has been seen as being implicit in the upper secondary school reforms in Sweden and Finland (Young, 1993b) but is not seen as evident in Australia.

Of course these models do not precisely match actual systems in operation, although they may provide a basis for mapping some aspects of those systems. They also draw attention to issues to be resolved such as the relative status of different qualifications in a dual model (the relative status may differ according to the pathway being considered), the extent of differences in approaches to teaching and learning between tracks or courses in a dual model, what is the effect of dual recognition in providing a form that combines features of the dual and the unitary models, the extent to which a unitary approach broadens access to post-school options, which forms of study in a unitary system have the strongest influence over matters of curriculum and assessment, and what are the practical implications of implementing an integrated model in a modern school system.

### ***Dual recognition and other vocational programmes***

A significant area of growth has been in the provision of vocational education and training (VET) courses as part of the school curriculum by schools in conjunction with TAFE Institutes and/or other VET providers. In most States this provision of VET courses by schools is confined to years 11 and 12. How the States incorporate VET provision within their schools is variable and presents State and Federal agencies with complex funding and counting issues.

In New South Wales for 1996 some 36 000 students in senior high school were involved in vocational education. This amounts to approximately 30 per cent of the cohort of students in grades 11 and 12. Many of these students were enrolled in courses which were jointly recognised for Higher School Certificate and VET purposes. In Victoria there has also been a formal inclusion and recognition of VET courses within its end of school certificate (the Victorian Certificate of Education) as Dual Recognition courses. By the end of 1996 there were 4 200 students enrolled in Dual Recognition programmes (just over four per cent of the relevant cohort). In addition a much larger number of Victorian school students were undertaking VET courses or modules outside the Dual Recognition framework. Other States and Territories are experiencing similar enrolment growth of secondary school students in VET courses but are also experiencing some difficulty in accurately measuring this phenomenon.

### ***School-industry programmes***

School-industry programmes provide students in the senior years of secondary schools with the opportunity for structured learning in a workplace which is assessed and accredited as part of their school work. They differ from work experience programmes in that they incorporate a goal of structured learning in the workplace (rather than an orientation) and they usually extend over a longer time frame. In many instances these school-industry programmes are a subset of the dual recognition programmes identified in the preceding section and they form part of a wider range of school-industry links (Price, 1991). School-industry programmes have expanded in recent years. For example, Victoria recently amended its Education Act to allow more flexible and extended work placement programmes for senior secondary students. The legislation encourages employer and skill centre partnerships with schools by providing worker compensation coverage to participating students.

A report by the Curriculum Corporation observed in 1993 that there was a large number of programmes in schools which incorporated *work-based learning* (Curriculum Corporation, 1994). For example, in New South Wales such links were embodied in the Training for Retail and Commerce (TRAC) course (a national programme), some school-initiated courses and Industry Studies offered as state-wide course. Lepani and Currie (1993) identified a number of benefits to students, teachers and industry from these programmes and pointed to solutions to some of the organisational obstacles to the wider implementation of such programmes. Consultations conducted by the Australian Student Traineeship Foundation indicated "a rich variety of actual and potential joint school-industry programmes throughout Australia" (ASTF, 1995). More recent survey information about these programmes indicates expansion of provision in 1995 and 1996 (Ainley & Fleming, 1996; 1997).

In 1995 some 46 per cent of schools provided, and 7 per cent of senior secondary students participated in, some form of programme that incorporated time in the workplace (Ainley & Fleming, 1996). In 1996 the corresponding figures were 60 per cent of schools and 12 per cent of students (Ainley & Fleming, 1997). Twenty per cent of schools in 1995, and 25 per cent in 1996, provided programmes which involved at least 20 days per year in the workplace, and a little more than 2 (2.3 per cent in both years) per cent of senior secondary students in those extended programmes. Growth between 1995 and 1996 appeared to have been

in programmes that incorporated work placements of short duration. An important challenge is to provide sufficient high quality placements for students.

School-industry programmes cover a range of industries. Hospitality was strongly represented with 19 per cent of programmes referring to that industry. Retail, commerce and clerical made up 32 per cent of programmes. Manufacturing, construction or trades made up 20 per cent of nominations (manufacturing itself constituted 10 per cent of programmes). Approximately 12 per cent of the programmes involved referred to service industries (the most frequent being health and community services). The remaining 17 per cent of programmes involved either agriculture (3 per cent), utilities (4 per cent) or were cross-industry (10 per cent). School-industry programmes aimed to develop a number of characteristics but developing vocational skills specific to particular industries was important to most. It might therefore be concluded that these programmes were seen as having a strong vocational emphasis. They were not seen only as an aspect of general education, although those goals were important.

Programmes across Australia vary in the organisation of, and time provided for, workplace learning in terms of required attendance at work sites, the percentage of programme time allocated to work placements, the total time spent in the workplace, and how the time in the workplace was used. The intention of school-industry programmes is that they should incorporate structured learning in the workplace. In practice, two-thirds of programmes used the time for structured learning (the remaining third used the time for observation and experience only).

There are many programmes of school-industry partnerships but some model initiatives include:

- the MOSEDG project in Victoria which brings together some 16 schools, over 90 employers and 200 students in workplace learning and follow-up job placement activities;
- the General Motors initiative in South Australia which combine apprentice level training and schooling;
- the Australian Newsprint Mill project with Claremont College in Tasmania;
- the Hunter Valley Training in Retail and Commerce (TRAC) project; and
- the Queensland Rockhampton project engaging local business and schools.

There has been a study of the effects of the Training in Retail and Commerce (TRAC) programme in one State (Tasmania) (Scharaschkin, 1994). In that programme, students enrolled in an industry-accredited vocational course spent one day a week in the workplace in addition to the four days in a classroom. The study was able to identify differences in teaching and learning in the TRAC programme compared to traditional classrooms in terms of: engagement, adult work ethos, authentic consequences, immediacy of feedback, tangible rewards and multiple learning sites. Scharaschkin identified enhanced student outcomes in terms of such things as: motivation and confidence, satisfaction, personal and practical skills, and time management skills. A separate study using a national sample of 500 participants in the same programme showed that TRAC graduates had an unemployment rate approximately half that of non-university bound school leavers as a whole and were 50 per cent more likely to be involved in further education and training through apprenticeships, traineeships or other forms of study (Dusseldorp Skills Forum, 1995). The authors attribute these differences to the effect of incorporating applied contextualised learning within a general education.

## **Work experience programmes in junior secondary school**

One of the ways in which general secondary schools provide for students to learn about work is through work experience programmes. Work experience programmes have been defined as “schemes in which people experience work tasks in work environments but without taking the full identity of the worker” (Watts, 1983). Typically these refer to programmes in which school students spend a limited time in a workplace with the intention of providing an orientation to the world of work in a general field but without a planned programme of skill development.

In Australia work experience programmes began in the late 1960s and early 1970s in schools with a more vocational orientation (eg. secondary technical schools) and the number of programmes increased through the 1970s as secondary schools began to use work placements as part of the school curriculum (Cole 1979: 31-42). By the early 1980s, work experience programmes were established features of school programmes and functioned under guidelines often with the support of advisers or kits of materials. Generally these work experience programmes take place in grades 9 or 10. Data gathered as part of the *ACER Youth in Transition* surveys of a national sample of 16-year-olds in 1986 indicated that some 89 per cent of young people had participated (84 per cent), or expected to participate (5 per cent), in work experience programmes during secondary school (93 per cent in government schools, 91 per cent in Catholic schools and 77 per cent in independent schools); and that on average, the programmes were of eight days' duration. These data are consistent with those published by the *Ministerial Review of Work Experience* in Victoria (Victoria, 1988) and the evaluation of work experience programmes conducted in Queensland (Hobbs, 1982).

Evans and Poole (1992) characterise work experience programmes as being partly concerned with vocational education (especially in relation to the character of workplaces, knowledge about particular jobs and related skills, and the formulation of vocational goals) and partly concerned with the social and life skills in the adult world generally (especially in relating to management and other workers). Evans and Poole found that students who participated in work experience rated those programmes highly in terms of value for future employment and enjoyment (but not quite as highly as a corresponding group of students from pre-vocational education programmes). Students also reported a sense of satisfaction with work experience in terms of gains in information, experience in and knowledge of specific job-related skills, and perceptions of their own competence in these skills: findings were consistent with other research. However, the authors conclude that:



*As a vehicle for helping students to develop other life skills or greater awareness of the nature of work, it would appear that there needs to be much more reflective activity in the school or college to make these programs more successful. In terms of the development of cognitive skills, they may be far too short to have a useful contribution.*

(Evans and Poole, 1992: 122)

### **Defining work related competencies**

One way of linking the work of general secondary schools with the world of work is to define work-related competencies and to use those to inform the programmes provided in schools. There are examples of attempts to define work-related competencies but it is not clear as to what extent the results of these have informed the programmes of general secondary schools.

In Australia, a major review of postcompulsory education and training argued that there should be a convergence between vocational and general education so as to foster a more creative and adaptable workforce (AEC, 1991). Its report proposed that employment-related competencies should be part of all forms of postcompulsory education. It argued that, by the time young people leave school, they should be competent in six key areas: language and communication, mathematics, scientific and technological understanding, cultural understanding, problem solving and personal and interpersonal areas. The nature of employment-related competencies was pursued further through the work of a subsequent committee of inquiry (Mayer, 1992). Its report identified seven generic work-related competencies conceptualised as transcending subject areas and providing links between school, vocational education and employment (Collins, 1995). These competencies, which were seen as generic to all kinds of work and to effective participation in many other social settings, were:

- *collecting, analysing and organising information;*
- *communicating ideas and information;*
- *planning and organising activities;*
- *working with others and in teams;*
- *using mathematical ideas and techniques;*
- *solving problems; and*
- *using technology.*

Subsequently an eighth competency (*cultural understanding*) was added.

At least part of the impetus for these ideas derived from a perception that substantial changes were occurring in the structure of the economy, in the organisation of industry and in economic relations with other nations which sharpened concern about the competitiveness of Australian industry (Wilson & Engelhardt, 1994). At the same time there was concern that traditional educational programmes were not developing appropriate employment-related skills among a sufficiently wide cross section of Australian youth. The emergence of employment-related competencies has implications for curricula in traditional fields of study in the senior secondary years (Lokan *et al.*, 1995) as well as for the arrangements made for new programmes designed to provide more explicitly vocationally oriented studies.

A recent project investigated the possibility of basing a system of Key Competencies assessments on global teacher judgements made on the basis of normal class work and other school activities (McCurry & Bryce, 1997). It trialled such an assessment system in a number of schools and the degree of convergence in the assessments of individuals by different teachers was assessed. It has also gathered information about reactions to the system and judgements about the value of the assessments. The proposed assessment was

based on the suggestion in the Mayer Report that Key Competencies assessments could be made in different programmes without entailing new or different assessment tasks. The project involved focussing and interpreting of the Key Competencies for the purpose of teacher-based judgements in general education programmes. It also elaborated the three levels outlined in the Mayer Report to form a broader scale and developed a method for recording teacher judgements efficiently and conveniently. The assessments were global impression judgements made by a range of teachers that could be subsequently synthesised into overall judgements and reported under the auspices of the school.

### **Careers education in schools**

Careers education (sometimes under the name of guidance, counselling or advice) has a long history in Australian secondary schools. The nomenclature varies among the states, as does the orientation that is adopted and the personnel who fill the role. A study conducted in 1985 concluded that the practice of those responsible for these services in schools did not always reflect the terminology applied to their role (Naylor, Elsworth & Day, 1985). However, it noted that in careers education there was a shift towards a developmental perspective. The study concluded that there was a need for both a national training policy for careers guidance and counselling staff in schools, and a programme of development and dissemination of careers education materials.

Since that time computer based information packages such as the Job and Course Explorer (OZJAC) system (and others such as SIGI Plus) have been developed and made available to schools. An evaluation of the use of Job and Course Explorer indicated that it could be effective as a source of information but that its effectiveness depended on the availability of other sources of advice and support (Owen *et al*, 1991).

A more recent report pointed to the importance of careers education in schools that provided senior school programmes for a wider range of students than in past years and were linking those programmes to the world of work (Dusseldorp, 1996). It asserted that in this new environment “the challenge is to develop links between schools’ work and training pathways and guidance that are as strong as the links between career education and guidance and the higher education pathway” (Dusseldorp, 1996: 7). Although there are policy statements about the need for comprehensive career education that is appropriately resourced, there are few national data on its provision and effectiveness (NBEET, 1991). A study by the Schools Council (1996) based on focus groups with a variety of young people concluded that there was considerable variation in their satisfaction with the careers services provided but that the information available was highly valued. Byrne and Beavers (1993), after a study of 17 high schools, were critical of what was provided in careers education and its links with the overall curriculum. They recommended a strategy for upgrading careers information centres in schools and providing better trained staff.

There is a number of examples of good careers education and guidance programme in Australian schools that use a range of resources and link to other aspects of the school curriculum (Dusseldorp, 1996). Such programmes can provide schools with valuable information about the destinations of their graduates. There are even examples where careers education in a school (at least with respect to a particular programme) extends to helping with job placement (as takes place in countries such as Japan). The challenge is to provide high quality careers education more widely and in a way that links to programmes of vocational preparation.

## 5. CONCLUSION

Australia is a high income country which has had a relatively high level of youth unemployment, and marginal employment, over the past two decades. It experienced a sharp increase in school retention rates through the 1980s until 1993 followed by a decline. There have been changes in the destinations of school leavers in Australia over the 1980s and 1990s. The destination of an increasing percentage of school leavers has been a programme of education or training rather than work. That increase has mainly been in university courses rather than vocational education and training. For these young people the transition from school to the world of work is indirect rather than direct. For those school leavers not proceeding directly to any further study there has been a decline in the percentage who work full-time and an increase in the percentage who work part-time. The growth in the percentage of young people whose first experience of working life is in part-time, and possibly marginal employment presents a challenge for policies concerned with transition.

Many aspects of the institutional provisions in Australia that impact on the transition from initial education to working life are changing as better arrangements for education and training are sought. In some ways it is the system itself that is in transition.

Part of the analytic framework developed by Hannan *et al* (1996) for the thematic review of the transition from initial education to working life refers to the education/training system and its relationship to labour markets. This provides a useful reference point for summarising developments in Australia.

- In terms of differentiation of the education-training system Australia has had a high level of differentiation between general and vocational education but is moving to a less differentiated system. The provision of vocational education through schools, the orienting of senior school programmes towards the world of work and the broadening scope of programmes in vocational education and training are some of the ways in which this is occurring.
- The situation with regard to standardisation of the education system is more complex. Through the compulsory school years there is a comparatively low degree of standardisation although the trend is towards a greater degree of standardisation of curricula and programmes. In the postcompulsory school years (Years 11 and 12) there is a comparatively high degree of standardisation (e.g. in assessment and certification procedures) within each State but there are differences between States. Consequently assessments at these levels are regarded as reliable and comparable between schools. The emergence of newer programmes of vocational education in schools has introduced elements with a lower level of standardisation (in the sense that assessment procedures are less uniform between schools) but there are initiatives to provide a uniform framework in this area. In the vocational education and training system the trend has been a move towards greater standardisation through standards and qualifications frameworks.
- In terms of labour market linkages the Australian pattern is similar to many other English-speaking countries as characterised by Hannan *et al* (1996): no direct linkages but market signals from schools are strong reliable and standardised. The development of vocational education in schools is resulting

in stronger linkages to the labour markets but only in the few schools where those programmes are strong.

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