

**Overview of
Student Costs and
Government Funding in
Post-compulsory Education and Training**

Sally Borthwick

Research and Evaluation Branch

October 1999

© Commonwealth of Australia 1999

ISBN 0 642 23888 X

This work is copyright. Apart from any use as permitted under the *Copyright Act 1968*, no part may be reproduced by any process without prior written permission from the Commonwealth available from AusInfo. Requests and inquiries concerning reproduction and rights should be addressed to the Manager, Legislative Services, AusInfo, GPO Box 1920, Canberra ACT 2601.

Acknowledgments

The author acknowledges the help and guidance of
Dr Terry Murphy in the preparation of this paper.

CONTENTS

EXECUTIVE SUMMARY	1
OBJECTIVES	3
STRUCTURE OF PAPER	3
I CONTEXTUAL SETTINGS	
1.1 The size and nature of the three post-compulsory sectors	4
1.1.1 Schools	
1.1.2 Vocational Education and Training	
1.1.3 Higher Education	
1.2 Educational expenditure and public and private sources of funding	7
1.2.1 Schools	
1.2.2 Vocational Education and Training	
1.2.3 Higher Education	
1.3 Pathways and links between sectors	10
1.3.1 Schools - Vocational Education and Training	
1.3.2 Schools - Higher Education	
1.3.3 Higher Education - Vocational Education and Training	
1.3.3.1 Movement between sectors	
1.3.3.2 Qualifications offered by both sectors	
1.3.3.3 Credit transfer and recognition of prior learning	
1.3.3.4 Funding implications of cross-sectoral study	
II GOVERNMENT FUNDING ARRANGEMENTS FOR INSTITUTIONS IN THE PUBLIC AND PRIVATE SECTORS	
2.1 Schools	14
2.1.1 Government assistance to non-government schools	
2.1.2 Commonwealth and State outlays	
2.1.3 Allocation of Commonwealth recurrent funds	
2.1.4 Levels of recurrent grants	
2.2 Vocational Education and Training	17
2.2.1 Contestability of the market	
2.2.2 Commonwealth and State outlays	
2.2.3 Commonwealth programmes	
2.2.3.1 The Training Reform Programme	
2.2.3.2 The ANTA Programme	
2.2.4 Allocation of funds to training activity through ANTA	
2.2.5 Competitive resource allocation	
2.2.6 User choice funding	

2.3	Higher Education	21
2.3.1	Contestability of the market	
2.3.2	Commonwealth and State outlays	
2.3.3	Allocation of Commonwealth funds	
III	UNIT COSTS	
3.1	Senior secondary school costs	23
3.1.1	Government schools	
3.1.2	Non-government schools	
3.2	Vocational Education and Training costs	26
3.3	Higher education costs	28
3.4	Overall costs across sectors	30
IV	COSTS OF EDUCATION AND TRAINING TO INDIVIDUALS	
4.1	Conceptual and empirical considerations	30
4.2	Fees and charges payable by students	31
4.2.1	Senior secondary schooling	31
4.2.2	Vocational Education and Training	32
4.2.2.1	TAFE fees	
4.2.2.2	Fee exemptions and concessions in TAFE	
4.2.2.3	Fees charged by commercial VET providers	
4.2.3	Higher Education	33
4.2.3.1	Higher Education Contribution Scheme	
4.2.3.2	Open Learning Deferred Payment Scheme	
4.2.3.3	Postgraduate course fees	
4.2.3.4	Undergraduate course fees	
4.2.3.5	Fees to overseas students	
4.2.3.6	Fees in the private sector	
4.2.3.7	Summary of fees and charges for different categories of full-time university students	
4.2.3.8	General Services/Student Services fee	
V	PUBLIC SUBSIDIES TO STUDENTS	
5.1	Subsidies to living costs	39
5.1.1	Youth Allowance	
5.1.2	Austudy payment	
5.1.3	ABSTUDY	
5.1.4	Assistance for Isolated Children	
5.1.5	Pensioner Education Supplement	
5.1.6	Beneficiaries and expenditure	
5.2	Public subsidies implicit in the price the student pays for education and training	42
5.2.1	Subsidies to school students	
5.2.2	Subsidies to VET students	
5.2.3	Subsidies to university students	
5.2.3.1	The HECS subsidy	
5.2.3.2	Subsidies to postgraduate students	

VI	CONCLUSION	
6.1	Government funding arrangements	46
6.2	Relative unit costs	47
6.3	Fees and charges payable by students	48
6.4	Public subsidies	48
6.4.1	Subsidies to living costs	
6.4.2	Subsidies implicit in the price the student pays for education and training	
6.5	Convergence and divergence	49
	BIBLIOGRAPHY	52

CHART	Page
1 Growth in EFTSU in Senior Secondary School, VET and HE, 1988-97	7

TABLES

1 VET sector recurrent income, 1996 and 1997	9
2 University operating revenue before abnormal items, 1996 and 1997	10
3 Student movement between VET and universities, 1994 and 1997	12
4 Estimated public expenditure on schooling: Commonwealth Specific Purpose Programmes, Commonwealth Financial Assistance Grants, and States Own Sources	15
5 Public recurrent funding for VET, 1994-97	18
6 Commonwealth VET funding, 1994-95 to 1997-98	18
7 Funding allocated to competitive activities: estimated amounts 1996-98	20
8 Per capita estimates of senior secondary operating costs in government schools, 1997-98	24
9 Index of national VET cost relativities for occupational training courses, 1996	28
10 Unit costs of course delivery for different university undergraduate courses, 1997	29
11 HECS repayment rates and income thresholds for 1998-99	34
12 Fee-paying postgraduate courses in Business, Administration and Economics, 1996	36
13 Course fees and contributory charges for full-time university students	37
14 Level of universities' General Services fees and charges per annum, 1997	38
15 Fortnightly rates for the Youth Allowance, 1998	40
16 Assistance for Isolated Children Allowances, 1998	41
17 Per capita total income and income from Commonwealth and State grants for non-government secondary schools, 1996	42
18 Proportion of full cost contributed by undergraduate students in various discipline group, 1997	44
19 Net present values of HECS payments for students in different HECS categories for a three year degree	45

ATTACHMENTS

A Relative Teaching Costs Matrix	50
B Beneficiaries of and expenditure on AUSTUDY/ABSTUDY/AIC, 1989-97	51

EXECUTIVE SUMMARY

The funding of educational institutions and the proportion of that funding which should come from private and public sources are the subject of much controversy. This paper seeks to inform that debate through the presentation of a range of information on government funding mechanisms, unit costs, and levels of public subsidy for senior secondary school (Years 11 and 12); vocational education and training (VET);¹ and higher education. The paper complements other recent work on expenditure on education and training.

Findings

Higher education has been the fastest growing sector over the past ten years, with an increase in student numbers of around 60 per cent. This rapid rate of growth has been partially funded from increased contributions by students. Pressures from growth have been less marked in vocational education and training, and numbers in senior secondary school appear to have plateaued.

Commonwealth/State funding shares

In 1997, the proportion of funding borne by governments was around:

- an estimated 93 to 95 per cent of revenue for government schools (covering basic costs);
- 56 per cent of revenue for non-government schools;
- 82 per cent of revenue for publicly funded VET; and
- 54 per cent of revenue for universities.

Out of this, the proportion of total government funding supplied by the Commonwealth was around:

- 12 per cent for government schools;
- 69 per cent for non-government schools;
- 35 per cent for VET; and
- 98 per cent for universities.

The States are responsible for the delivery of government schooling and of VET. Government funds go to private as well as public providers in schools and some areas of VET. In higher education public funds go only to institutions on a legislatively designated list.

Unit costs

Available estimates of unit costs are not readily comparable across sectors. Different sectors use different assumptions, definitions, source data and methodology to work out their unit costs, suggesting a need for further research to identify areas of commonality and difference. With these caveats, the estimates below suggest more overall similarity in the rough order of magnitude of costs for the different sectors than might have been expected.

Estimates of the recurrent unit cost per full-time equivalent student range from approximately \$6,600 for senior secondary students in Catholic schools to \$9,300 for undergraduate education at the university level.²

¹ The focus is on publicly funded VET. Limited data are available on VET provision which is not publicly funded.

² VET costs have been estimated on an equivalent full-time yearly basis for purposes of comparison. The average student load in VET is under 200 hours, giving an estimated cost per student of less than \$2,300 a year.

Student fees and contributions

On a per capita basis, students pay average annual fees and charges of:

- up to an estimated \$800 a year in government secondary schools (mainly voluntary);
- around \$1,500 in Catholic secondary schools and \$4,500 in independent secondary schools; senior secondary fees are often higher;
- \$400 per full-time equivalent student in VET; and
- \$3,500 for a full-time undergraduate in higher education paying HECS upfront.

Actual amounts paid vary widely around the mean.

Public subsidies to students

As a proportion of recurrent unit costs of education and training, public subsidies contribute on average:

- up to 95 per cent of costs for government school senior secondary students;
- around 64 per cent of costs for senior secondary students in Catholic schools and around 35 per cent of costs for those in independent schools;
- around 95 per cent of costs for students in publicly funded VET; and
- around 66 per cent of costs for a university undergraduate paying upfront HECS.

As with student fees and contributions, actual levels of subsidy vary widely around the mean. While relative subsidies to VET students are higher than to university students, in terms of absolute amounts the average VET student receives a considerably lower subsidy than the average higher education student due to the shorter duration of most VET courses. Students may also be subsidised through means-tested Commonwealth income support payments (not included in the costs above).

Conclusion

Varying cost structures and levels of subsidies are to be expected in sectors with different missions, student populations, and geographic dispersal, with associated differences in terms of class sizes and class contact hours. At the same time, boundaries between the three sectors are becoming increasingly permeable as new pathways and links open up between them. While each sector will retain its distinctive mission, and diversity in funding arrangements is thus likely to continue, each faces common pressures for accountability and efficiency. This paper does not canvass policy options, but rather seeks to provide information which will contribute to a framework for their discussion.

OBJECTIVES

The paper's primary objectives are to:

- describe public funding arrangements, with a focus on recurrent funding, for public and private institutions in the three sectors of post-compulsory education and training;
- outline the unit costs of course provision to institutions; and
- indicate what students pay in terms of fees and other contributory charges and the extent to which they are publicly subsidised.³ The paper covers costs and subsidies to students in:
 - senior secondary schooling, ie. Years 11 and 12;⁴
 - vocational education and training (VET); and
 - higher education.

In addition to providing information on student costs and government funding, including the extent of public subsidy to different sectors, the paper seeks to identify a number of relevant issues as a basis for policy formulation. The paper does not however attempt to canvass policy options. It complements other work undertaken on expenditure on education and training, in particular that conducted by Dr Gerald Burke at the Centre for the Economics of Education and Training.

STRUCTURE OF PAPER

The paper is structured as follows:

- Section I provides the contextual settings for the three sectors of post-compulsory education and training. This section notes:
 - the size and nature of the three sectors;
 - overall expenditure and the percentage of public and private funding; and
 - pathways and links between sectors.
- Section II considers government funding arrangements for public and private institutions in the three post-compulsory sectors. The focus is on recurrent funding.
- Section III outlines unit costs in these sectors, again with a recurrent focus.⁵
- Section IV treats the costs of education and training to individuals. This section deals with:
 - conceptual and empirical considerations; and
 - fees and charges payable by students.

³ The VET sector refers to its students as 'clients'. For consistency, this paper uses 'students' for all three sectors.

⁴ Compulsory education ends at 15 in all States except Tasmania, where the school-leaving age is 16. It is not feasible, however, to isolate costs for students aged 15/16, so the study relates to students in senior secondary school. Virtually all students at this level are over the school leaving age.

⁵ Inclusion of capital costs would raise problems at the tertiary level of disaggregating the data to allow for research and fee-for-service uses.

- Section V deals with public subsidies:
 - to individuals on the basis of need for purposes of subsistence. These include the Youth Allowance (available both to students and unemployed young people) and Austudy, ABSTUDY and Assistance for Isolated Children (available to students only). This section also refers to the AUSTUDY scheme which was in place prior to the introduction of the Youth Allowance and Austudy.
 - to institutions or systems to meet the gap between student contributions and the cost of course delivery.

- Section VI concludes the paper with a summary of its main findings.

SECTION I: CONTEXTUAL SETTINGS

1.1 The size and nature of the three post-compulsory sectors

There are a range of factors influencing the demand for education and training. Although demographic trends obviously exert some influence on demand, there does not appear to be a high correlation between the two. Strong growth in the 15-19 age group in the mid 1980s was followed by more moderate growth towards the end of the decade. Numbers in this age group declined between 1990 and 1995, but have risen slightly since then. Trends in participation rates appear to have a greater influence than demographic trends on the number of young people engaged in education and training.

For the years between 1988 and 1997, the highest rate of growth has been experienced in the university sector. The VET sector has also grown. Senior secondary numbers had fallen back to around their 1988 level in 1996, but have since risen.

1.1.1 Schools

Numbers of full-time students in Years 11 and 12 rose from around 372,000 in 1988 to peak at 407,000 in 1992. Student numbers dropped back to around 371,000 in 1996, but had risen to 391,000 by 1998.⁶ Senior secondary students formed 31 per cent of the total full-time secondary school population in 1992, but had fallen by 1998 to 29 per cent of the total full-time secondary population.

Students in non-government secondary schools formed 35 per cent of the total number of full-time secondary school students in 1998. The proportion rises slightly in senior secondary school, with 37 per cent of full-time Year 11 and 12 students attending a non-government school.

⁶ Australian Bureau of Statistics (ABS), *Schools Australia, 1988-98*, Catalogue No. 4221.0. For comparability, only statistics relating to full-time students are shown. ABS statistics on part-time students were first published in 1995. MCEETYA's *National Schools Statistics Collection, 1995*, lists numbers of part-time students from 1989 on but does not give year levels. The lower numbers in senior secondary school in the later years are due partly to demographic factors and partly to a drop in the apparent retention rate: retention to Year 12 dropped from 77.1 per cent in 1992 to 71.6 per cent in 1998. Total full-time enrolments for all levels of schooling were 3,199,000.

1.1.2 Vocational Education and Training

Numbers of students in vocational programmes in TAFE (Technical and Further Education) and other government providers rose by almost 20 per cent to 1,141,000 between 1988 and 1997 (the actual growth figure is higher as the base figure for 1988 included students taking courses in the Adult and Community Education [ACE] sector in some states). An additional 225,000 students were taking publicly funded vocational education programmes provided by community education providers and 93,000 were taking such programmes through other registered providers (chiefly private providers), giving a total of around 1,459,000 in 1997.⁷ There was a 40 per cent increase in the number of publicly funded students in vocational programmes between 1992 and 1997.

Unless specifically indicated, reference to the VET sector in this paper is to publicly funded VET; that is, figures do not include private providers not in receipt of public funding.⁸

In terms of equivalent full-time student units (EFTSU), TAFE numbers in vocational programmes rose from around 302,000 in 1988 (including some students in the ACE sector) to around 378,000 in 1997. In addition, around 42,000 EFTSU in vocational courses were spread throughout adult and community education (15,000 EFTSU) and other registered providers (27,000 EFTSU), giving a total of around 420,000 EFTSU.⁹ It should be noted that full-time study is a minority pattern of participation in VET.

There are no direct measurements of numbers receiving training from commercial training providers. However, an estimate can be made based on number of hours taught. In total, it is estimated that commercial training providers delivered 6.6 million hours of training in 1994, compared with about 31 million hours delivered by TAFE and ACE providers.¹⁰ For the same year, participants attending courses conducted by commercial training providers received around 58

⁷ National Centre for Vocational Education and Training Research (NCVER), *Australian Vocational Education and Training Statistics, 1997, In Detail*, 1998, Table 1. The publication provides explanatory notes on rules applied for the purpose of counting students. Of the 92,600 students listed under other registered providers 5,400 were taking VET programmes delivered in schools in South Australia and Queensland. The remainder were taking programmes offered through private providers in receipt of government funds (information supplied by NCVER).

⁸ 'Publicly funded VET' covers all VET activity administered or provided by the main VET training authority in each State, other public VET organisations in that State, and the Australian National Training Authority.

⁹ *Ibid.* Note that data on student numbers for VET are discontinuous, containing a break between 1993 and 1994, when an expanded data collection standard was adopted. A break also occurred in 1995 with the inclusion of community education providers and in 1996 with the inclusion of private providers.

The term EFTSU has been used for consistency with the higher education sector. While the concept of EFTSU is used to facilitate comparisons between sectors, it should be noted that the use of EFTSU as a measure is contentious within the VET sector: assumptions about the quantity of effort which constitutes an EFTSU have occurred over a number of years with no national position being resolved. The standard for data collection in publicly funded VET, the Australian Vocational Education and Training Management Information and Statistical Standard (AVETMISS), does not include a concept of full-time or part-time participation in VET. However, the electronic information system of the AVETMISS collection derives full-time participation using 75 per cent of the notional full-time effort measured as 720 hours per year, or 540 hours per year. Notional full-time effort or 720 hours has been taken as the basis for EFTSU in the figures given above. EFTSU numbers would obviously be higher if based on the 540 hours per year which is considered to constitute full-time participation.

¹⁰ See ABS, *Commercial Training Providers, Australia, 1994*, Catalogue No. 6352, 1996, Tables 11 and 13, pp. 12, 15. The ABS survey covered private sector organisations and individuals who conducted vocational training on a commercial basis. Data on TAFE/ACE come from the Australian Committee on Vocational Education and Training Statistics, *Selected Vocational Education and Training Statistics, 1994*, p. 159 and 1995, p. 10. Figures for student contact hours are for vocational courses only; figures for course delivery hours include personal enrichment courses, which account for around 4 per cent of student contact hours. Course delivery hours for the public sector are approximate. Since data for private providers and TAFE/ACE come from different sources, they may not be strictly comparable; however, they can provide a rough guide to comparisons of order of magnitude.

million hours of training, compared with about 261 million student contact hours for the TAFE and ACE sector. On the basis of both hours of training delivered and hours of training received by participants, this indicates that the commercial training providers sector is approaching one fifth the size of the TAFE/ACE sector.¹¹

The Australian Bureau of Statistics estimated that almost 3,200 private sector organisations provided training on a commercial basis in 1994, of which almost 1,500 organisations operated primarily as training providers.¹² There are now over 3,000 private and industry training providers who are registered training organisations.¹³

Overall, an estimated 80 per cent of wage or salary earners had undertaken some form of training in the twelve months prior to an ABS survey in 1997. The largest component of this figure was on-the-job training, which was undertaken by an estimated 72 per cent of workers.¹⁴

1.1.3 Higher Education

The total number of students (including overseas students) enrolled in higher education courses has risen from around 421,000 in 1988 to around 672,000 in 1998, an increase of around 60 per cent. In terms of EFTSU, enrolments (including overseas students) have risen from just under 329,000 in 1988 to 524,000 in 1998.¹⁵ Numbers of overseas students have risen from 21,000 in 1989 to 72,000 in 1998, or around 11 per cent of the total student body.

These figures exclude enrolments in the two private universities, Notre Dame and Bond University and in other private higher education institutions such as theological colleges offering accredited higher education courses. Notre Dame enrolled around 1,200 students and Bond University around 1,500 students in 1998. In total the private higher education sector has 49 institutions offering some 186 accredited higher education programmes leading to awards including undergraduate and postgraduate degrees.¹⁶ The total number of non-overseas students taking courses at these institutions is estimated at around 5,000. Private providers outside the higher education sector may offer degree courses in association with universities.¹⁷ In addition to domestic provision, higher education programmes offered by overseas institutions are accessible through global communications technology and on-shore franchising arrangements.

Total growth in EFTSU for the three sectors between 1988 and 1997 is given below. The chart does not include VET or higher education students who are not publicly funded.

¹¹ ABS figures do not include internal training conducted by a firm or training conducted by equipment suppliers and manufacturers where this is not on a commercial basis. Commercial training providers formed 37 per cent of registered private providers (including community providers) in 1994 (Allen Consulting Group, *Establishing an Effective Training Market*, p. 15).

¹² ABS, *Commercial Training Providers, Australia, 1994*, Table 1, p. 2.

¹³ ANTA, *Australia's National Strategy for Vocational Education and Training 1998-2003*, p. 8.

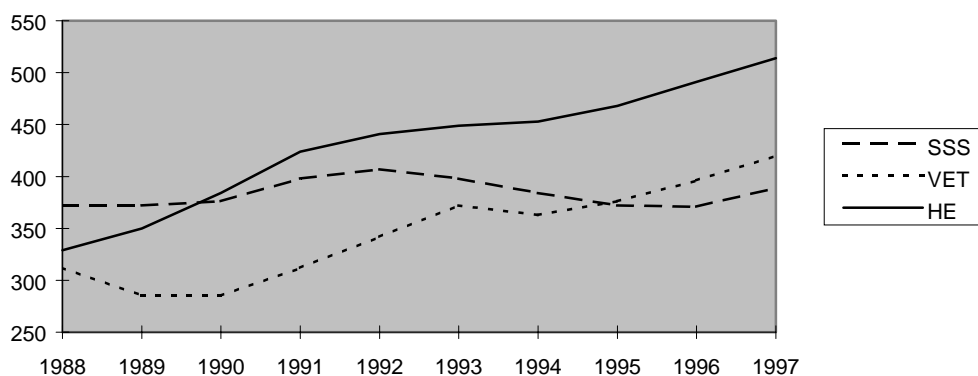
¹⁴ The figure refers to those who held a wage or salary job in the twelve months prior to the survey. ABS, *Education and Training Experience Australia 1997*, Catalogue No. 6278.0, p. 19.

¹⁵ DETYA, *Selected Higher Education Student Statistics, 1998*, pp. 12, 14.

¹⁶ Australian Council for Private Education and Training, *Submission to the Review of Higher Education Financing and Policy*, Section 2.2, 1997. To these figures must be added the new Melbourne University Private, opened in August 1998.

¹⁷ The number of private providers offering degree courses appears to be growing but there is a scarcity of information on the number of students involved. DETYA holds data on such students only if they are listed as enrolled in the associated university (where the university is DETYA-funded).

Chart 1: Growth in EFTSU (000s) in Senior Secondary School, VET and HE, 1988-97



Sources: *Schools, Australia*, ABS 4221.0 1988-97, Table 6; National Centre for Vocational Education Research (NCVER), *Australian VET Statistics 1997*, At a Glance: Time Series, p. 12 and NCVER data; DEETYA, *Selected Higher Education Student Statistics*, 1997, p.17.¹⁸

1.2 Educational expenditure and public and private sources of funding by sector

Educational expenditure on formal education for 1996 (1995-96 for government schools) was

- \$12.1 billion for government schools;
- \$5.2 billion for non-government schools;
- \$3.9 billion for the publicly funded VET sector; and
- \$7.6 billion for the publicly funded higher education sector.

Figures include capital spending but exclude transfer payments such as AUSTUDY.¹⁹

Substantial differences exist between sectors in the proportion of funding drawn from government sources. For 1997, Government funding accounted for:

- an estimated 93 to 95 per cent of revenue for government schools (covering basic costs);
- 56 per cent of revenue for non-government schools;
- 82 per cent of revenue for publicly funded VET; and
- 54 per cent of revenue for publicly funded higher education.²⁰

¹⁸ The caveats mentioned under Section 1.1.2 apply to the VET figures. Although overall growth in upper secondary school enrolments in the current decade has not been strong, the previous decade was a period of considerable expansion. 1997 has been taken as the cut-off date to enable comparability across sectors.

¹⁹ Australian Bureau of Statistics (ABS), *Australian Social Trends 1998*, Cat. No. 4102.0, p. 89. Government school data excludes payroll tax, long service leave, teacher housing, student hostels, and funds raised by schools, school councils or community organisations. Non-government school data excludes school boarding houses. VET expenditure covers employee costs including superannuation, supplies and services, payments to non-TAFE providers for VET delivery, other operating, financing and investment expenses, and capital expenses. The higher education figure includes academic activities and research, libraries, support services, buildings and grounds, administration, other expenses, and superannuation.

²⁰ The figure for government schools is an estimate from the report of the Senate Employment, Education and Training Reference Committee, *Not a Level Playground: the Private and Commercial Funding of Government Schools*, 1997, p.29. For non-government schools see MCEETYA, *National Report on Schooling in Australia: 1997*, p. 19; for VET, ANTA *Annual National Report, 1997*, v. 1 pp. 50-51; for universities DEETYA statistics as per *Higher Education Report for the 1999 to 2001 Triennium*, 1999, Figure 1.4. The most recent data for non-government schools are from 1996; this year has therefore been chosen for purposes of comparability.

Government funding for higher education is projected to drop to around 45 per cent by 2001.²¹

Private inputs (mainly parental) provide the balance of revenue in the school sector. With tertiary education, the contribution of individuals can be readily estimated, but that of industry is more difficult to identify. For 1997, student charges accounted for:

- around 5 per cent of recurrent revenue for the publicly funded VET sector;²² and
- around 25 per cent of operating revenue for the publicly funded higher education sector.²³

Student fees are of more fundamental importance for private VET providers, the majority of whom receive no public funds.

Considerable structured training is also carried on outside the formal training system. In the September quarter in 1996 employers reported spending around \$1,178.8 million on structured training, or about \$4,715.2 million on an annualised basis. About 47 per cent of this expenditure was on employees' wages and salaries during training.²⁴

Details on the level of government and private funding in each sector follow.

1.2.1 Schools

Government schools are estimated to receive between 5 and 7 per cent of their income from private sources (mainly parental contributions).²⁵

Among non-government schools there is a significant difference between Catholic secondary schools, which receive 30 per cent of their income from private sources, and independent secondary schools, which receive 62 per cent of income from private sources.²⁶ No figures are available specifically for senior secondary school, but the fact that fees for this level of education are frequently higher than for the earlier years, while government subsidies are the same for senior as for junior high school, suggests that overall a higher proportion of income derives from private sources at the senior secondary level.²⁷

²¹ See *Higher Education Report for the 1999 to 2001 Triennium*, Figure 1.4. Figures do not include Commonwealth funding for, or HECS revenue derived from, supplementary places for HECS-liable students. State funding is assumed to remain constant at the 1997 level.

²² The national figure for the percentage of revenue coming from student fees and charges averages out State variations (1.8 to 12.1 per cent). It should also be borne in mind that the publicly funded VET sector offers relatively high levels of fee exemption and concession, so that students who do pay full fees pay more than this percentage would indicate.

²³ HECS accounts for 15 per cent of operating revenue. DETYA, *Selected Higher Education Finance Statistics*, 1997, Table 1, p. 16. This figure assumes full repayment of HECS debt. The actual figure is somewhat lower because of non-payments and absence of interest.

²⁴ ABS, *Employer Training Expenditure Australia, July to September 1996*, Cat. No. 6353, 1997, Table 1.2, p.2.

²⁵ Senate Committee, *Not a Level Playground*, p. 29.

²⁶ DETYA, unpublished data for 1997 on income per student for non-government secondary schools. Combined secondary and primary schools form a separate category from other non-government secondary and primary schools. As it is not possible to disaggregate data on combined schools into primary and secondary components they have not been taken into account in the figures above.

²⁷ *The Right School for your Child? The Official Directory of the Association of Heads of Independent Schools of Australia* gives fee differentials where these are charged. A year of senior secondary schooling can cost up to \$1,000 more than junior secondary.

1.2.2 Vocational Education and Training

Total expenditure on structured training in 1997 was estimated to be around \$8 billion; governments and enterprises each contribute 45 per cent, while individuals invest the remaining 10 per cent.²⁸

The level of private expenditure, around \$4.4 billion (55 per cent), is an estimate of expenditure on training by enterprises and individuals and includes training internal to an enterprise, total wage and salary costs for receiving training and providing training and other non-wage and salary costs. This figure does not include the costs associated with unstructured training.

Around 45 per cent of all training expenditure in Australia is incurred within publicly funded VET organisations.²⁹ Around 80 per cent of income for publicly funded VET comes from government recurrent grants, principally from the States (75 per cent), with the Commonwealth contributing the remainder. Around 11 per cent comes from capital grants, principally from the Commonwealth (61 per cent) with the States contributing the remainder.

Table 1: VET sector recurrent income, 1996 and 1997

Source	1996		1997	
	\$m	% of total	\$m	% of total
Government (Comm. & State)	2,564	79	2,736	79
Fee for service	347	11	360	10
Student fees and charges	149	5	166	5
Ancillary trading and other	189	6	197	6
Total	3,249	100	3,458	100

Source: Australian National Training Authority, *Annual National Report 1996*, p.51, and *1997*, p. 42. Figures may not add to total due to rounding.³⁰

In 1996 under two per cent of VET students receiving publicly funded training had this training delivered by a private VET provider. By 1997, however, this figure had grown to nearly six per cent.³¹

1.2.3 Higher Education

DETYA provides operating grants to forty higher education institutions. Figures which follow relate to these entities. The majority of government funding comes from the Commonwealth Government, with the State Governments providing only 1.1 per cent of total operating revenue in 1997. Average institutional revenue from Government sources is scheduled to fall to less than 50 per cent once the effects of HECS increases introduced in 1997 flow through.³²

²⁸ ANTA, *Annual National Report, 1997*, Vol 3, p. 7. The figure may be somewhat inflated by double counting, in that some employer expenditure on training goes to VET institutions.

²⁹ The financial data focuses on VET provision which is funded wholly or in part from public funds. It includes providers such as public institutions, private entities, group training companies, industry, schools and higher education institutions. Under current scope and boundaries, information about the funds received by these providers is not collected unless they are distributed from public VET training organisations.

³⁰ These figures do not include Commonwealth Specific Programmes or assumed and other liabilities.

³¹ NCVER, *Australian Vocational Education and Training Statistics 1996, At a Glance*, Table 1b and *1997, At a Glance*, Table 1. NCVER provided data on the proportion of registered providers who were private providers.

³² DEETYA, *Learning for Life: Review of Higher Education Financing and Policy*, p.115.

It will be seen that the higher education sector receives a considerably higher proportion of its income from sources outside government than does the VET sector.

Table 2: University operating revenue before abnormal items, 1996 and 1997³³

Source	1996		1997	
	\$m	% of total	\$m	% of total
Government (Comm. & State)	4,677	58	4,513	55
Fees and charges	1,078	13	1,227	15
HECS	933	12	1,210	15
Other (inc. investments, donations)	1,364	17	1,269	15
Total	8,052	100	8,218	100

Source: DEETYA, *Selected Higher Education Finance Statistics, 1996*, p. 3, and *1997*, p. 3. Figures may not add to total due to rounding.

1.3 Pathways and links between sectors

The need for increased skilling of the workforce, both in terms of entry level and continuous training, has combined with pressures for greater efficiency and effectiveness in education and training spending to forge closer linkages between schools, VET and higher education. Governments and institutions are seeking to improve cross-sectoral links and to remove barriers to students moving across the education and training spectrum.

For convenience, schools, VET and higher education have been discussed as distinct sectors. It must be recognised, however, that accredited VET and university courses can be taken in schools and similarly accredited higher education courses can be offered by VET institutions in conjunction with either a domestic or an overseas university. Universities may also tender to offer VET programmes. With the exception of the school-VET link, these activities tend to be marginal to the main activities of the sector and involve relatively few students. They do, however, represent substantial change compared to the demarcations which existed a decade ago.

In the movement toward a seamless system of post-secondary education and training, the VET sector is concerned to ensure that each sector maintain its distinctive responses to its clients. The response of the Australian National Training Authority (ANTA) to the West Review's discussion paper, *Learning for Life*, emphasises the differences existing between the sectors in terms of student characteristics and needs; employment destinations and outcomes of graduates; provider types and operation; character of products and services offered; role of industry; policy influences; and the nature of government financial support and regulation.³⁴

³³ Commonwealth Grants include a capital component. Abnormal revenue items include, for example, the sale of a large capital asset or Commonwealth Government appropriations in advance. 'Fees and charges' includes revenue from fee for service activities.

³⁴ ANTA, Response to *Learning for Life*, December 1997. ANTA was established under the *Australian National Training Authority Act 1992*, following an agreement by Heads of Government to establish a national focus for VET with strong industry input.

1.3.1 Schools-Vocational Education and Training

VET in schools has become a high priority in recent years. It is based on the view that schools must take responsibility for improving the outcomes of all students, including those who do not go on to university. Improvement of the pathways between school and work is seen as reducing the risk of unemployment for young people.

Vocational training takes place not only in classrooms but also through school-industry programmes under which students spend time in the workplace. Classroom training may be conducted by school staff or staff from TAFE institutions and private training providers.

Where school-VET alliances occur in the delivery of training to secondary students, payment arrangements are worked out between the school and the training provider. DETYA does not hold data on the total number of students taking VET courses in school, although estimates derived from systems data indicate that in 1997 there were 92,000 participants in VET in schools activity and in 1998 there were nearly 114,000.³⁵ It is thus difficult to track the movement of school students into the VET area, or assess whether they find it economically advantageous to take VET courses while still at school rather than in the VET system.

There has been a rapid increase in the number of senior secondary students participating in school-industry programmes which involve students spending time in the workplace. 12 per cent of senior secondary students participated in such programmes in 1996, up from 7 per cent in 1995. The majority of programmes articulate into post-school qualifications: 73 per cent of school-industry programmes resulted in credit towards a TAFE or other VET course, while 27 per cent contributed to a student's Tertiary Entrance Rank or equivalent.³⁶

1.3.2 Schools - Higher Education

Cooperation between schools and universities has increased in recent years, with the adoption by a number of universities of credit transfer arrangements between the sectors similar to the US 'Advanced Placement' programmes. The arrangements generally allow a small number of high achieving students to take a university-level course while still at school with subsequent credit transfer to the university offering the course. Universities offering such programmes have found that it gives them a competitive advantage in recruiting high achievers. One example of credit transfer is an extension programme for top ACT school students set up by the Australian National University and ACT education authorities. Students pay a small materials fee, but tuition costs are heavily subsidised by the university.³⁷ Melbourne University does not charge students participating in their scheme, but schools may levy a small charge to help cover teaching costs.³⁸ In New South Wales, multi-campus sites allow school students to study university courses and TAFE subjects at nearby tertiary institutions.³⁹

³⁵ MCEETYA Taskforce on VET in Schools. VET in Schools has many different aspects and other sources of data may provide different figures from those given here.

³⁶ John Ainley and Marianne Fleming, Australian Council for Educational Research, *1996 School - Industry Programs: National Survey Summary Report*, p. 10.

³⁷ Information provided by the Australian National University.

³⁸ University of Melbourne, *Melbourne University Program for High Achieving Students*.

³⁹ *Daily Telegraph*, 7 August 1998.

1.3.3 Higher Education - Vocational Education and Training

Closer linkages between higher education and VET are developing as a result of student movement between sectors, awards offered in both sectors, and arrangements for credit transfer and recognition of prior learning.

1.3.3.1 Movement between sectors

The movement of VET students to universities has increased substantially in recent years. There is also appreciable movement by university students undertaking publicly funded VET courses, as Table 3 indicates. Unfortunately it is not possible to obtain directly comparable statistics in the two sectors, as Higher Education figures are collected only for commencing students and VET statistics are collected only for the student body as a whole. The figures for the movement of university students to VET given in Table 3 are for VET students in vocational programmes with a completed degree, postgraduate diploma, or undergraduate diploma;⁴⁰ figures for movement from VET to universities are for commencing university students whose highest prior qualification is a TAFE award.

University to VET percentages given in Table 3 are expressed as a percentage of the total number of students. If students whose qualifications are not known are excluded from the total, the percentage of VET students with undergraduate diplomas, degrees or postgraduate qualifications rises to 9 per cent.

Table 3: Student movement between VET and universities, 1994 and 1997⁴¹

Student movement	1994		1997	
	students	% of total	students	% of total
VET to university (commencing students only)	15,800	7.0	22,400	8.4
University to VET (all students)	39,800	3.6	76,700	5.3

Source: DEETYA, *Selected Higher Education Student Statistics, 1994 & 1997*, Table 25; NCVER, *Selected Vocational Education and Training Statistics, 1994*, Table 3; and *Australian Vocational Education and Training Statistics, 1997*, Table 9.

1.3.3.2 Qualifications offered by both sectors

VET now delivers accredited higher education programmes while higher education institutions deliver accredited VET programmes, although the numbers involved are very small.

A number of higher education institutions have taken advantage of opportunities afforded by contestable funding in the VET sector to register as VET providers and bid for the delivery of

⁴⁰ 15,300 students, or one per cent of the total, listed undergraduate diplomas under prior educational qualifications. These qualifications come predominantly from the higher education sector (including students who received diplomas in the former Colleges of Advanced Education), but the numbers could also include students in the VET system who regarded their qualifications as equivalent in level to an undergraduate diploma.

⁴¹ No information is available on the number of degree-holders among commencing VET students or the number of holders of TAFE qualifications among the total number of university students.

publicly funded VET activity. In Victoria, several universities have registered as private VET providers. ANTA has expressed some concerns about whether higher education institutions will meet the provider registration requirements and the nationally endorsed requirements for course provision and assessment developed through ANTA.⁴²

The number of students in Advanced Diploma courses has grown rapidly in the publicly funded VET sector, with around 45,700 students taking Advanced Diploma courses (Australian Qualifications Framework) or their equivalent in 1997 compared to 23,000 at the same level in 1995. Enrolments in Bachelor's degree courses have remained small, with under 50 enrolments in 1997. Some institutions now also offer Graduate Certificates in particular specialities. In higher education the number of students in Diploma courses (Australian Qualifications Framework) has dropped from around 11,000 in 1995 to around 6,000 in 1998.⁴³

A number of universities have linked up with TAFE institutions to offer dual awards in particular disciplines. This means that at the end of the course the student receives both a higher education degree and a VET qualification.

1.3.3.3 Credit transfer and recognition of prior learning

Credit granted for VET studies by higher education institutions has increased rapidly in recent years. In 1995, 50 per cent of TAFE Diplomates entering higher education programmes received some credit whereas only 20 per cent received credit in 1990. Between 1995 and 1998 a significant rise occurred in the number of students admitted to bachelor level courses on the basis of a complete or incomplete TAFE course (other than a secondary education course). Numbers rose from around 12,300 in 1995 (the first year for which these data are available) to 14,400 in 1998. The data do not however indicate the level at which these students were admitted.⁴⁴

In 1997 universities mainstreamed previously piloted schemes for university recognition of academic credits earned in TAFE courses in eleven fields of study. Schemes in two more fields of study are currently being piloted. Universities have also agreed to examine articulation with private sector providers of vocational courses.

A lower proportion of VET students receive credit for university qualifications. 13.3 per cent of the 43,702 degree or postgraduate diploma students in VET in 1995 received recognition of prior learning or credit transfer for at least one module.⁴⁵

1.3.3.4 Funding implications of cross-sectoral study

ANTA has identified funding as a problem for collaborative arrangements between the sectors, noting that 'the scope for further inter-sectoral collaboration is constrained nationally by the different funding arrangements for higher education and VET and the consequent issue of how and to whom the cost of shared programmes or resources is to be allocated'.⁴⁶ This issue is particularly salient in multi-sector institutions where higher education and VET staff in the one institution have different pay and conditions. The question of funding arrangements between different sectors is

⁴² ANTA, *Submission to the Review of Higher Education Financing and Policy*, 1997, Section 2.9.

⁴³ *Ibid*, p. 30; *Australian Vocational Education and Training Statistics 1995*, p.36 and 1997, p.35; *Selected Higher Education Student Statistics, 1995*, p. 18 (under Associate Diploma) and 1998, p. 25.

⁴⁴ *Selected Higher Education Student Statistics, 1995*, p. 49 and 1998, p. 64.

⁴⁵ ANTA, *Submission to the Review of Higher Education Financing and Policy*, 2.6, p. 8 of 12.

⁴⁶ ANTA, *Submission*, Overview, p. 2.

also complicated by fact that the States play a greater role in VET than they do in higher education, which is primarily a Commonwealth responsibility.

Where it is possible for the student to transfer credit from school courses to the VET sector and from VET to the university sector, the question of whether units of study can be more economically undertaken in one sector rather than another becomes relevant. Costs to the student are dealt with in Section V, which looks at the cost of education and training to individuals across the three sectors.

Governments also have an interest in the relative cost of course delivery. Data in this field are approximate and do not provide reliable indicators of course costs in each sector. They can nonetheless be taken as supplying a broad picture which can be modified as more reliable figures become available. Unit costs of course delivery are dealt with in Section III.

SECTION II: GOVERNMENT FUNDING ARRANGEMENTS FOR INSTITUTIONS IN THE PUBLIC AND PRIVATE SECTORS

This section describes the varying arrangements in each sector for the distribution of government funds to eligible public and private institutions. The institutional costs of education and training providers may be distinguished in terms of recurrent costs and capital costs (although recent arrangements have rolled the bulk of universities' capital funding into their recurrent costs).⁴⁷ The present paper is primarily concerned with recurrent costs. Similarly, research costs in the higher education sector are excluded from the discussion where possible.

The funding of education and training institutions in the public and private sectors may derive from: student fees; Commonwealth and State government funding; private endowments; and earnings from the provision of services, eg consultancies or courses. This section deals with institutional funding from government sources to schools, the VET and higher education.

The delivery of government schooling and of VET is the responsibility of the States.

2.1 Schools

2.1.1 Government assistance to non-government schools.

Government support for private or non-government schools commenced in the 1960s. The abolition of the New Schools Policy in 1996 has facilitated the entry of new non-government schools into the market. In 1996-97 non-government schools received around 20 per cent of total government expenditure on schooling.

2.1.2 Commonwealth and State outlays

Little information is available specifically on senior secondary funding. Consequently, much of the following discussion will deal with schooling at all levels or with secondary schooling as a whole. About 12 per cent of public funding for government schools is provided by the Commonwealth

⁴⁷ 'Recurrent costs' refers to operating expenditure, eg expenditure on salary costs. 'Capital costs' is expenditure on fixed assets undertaken to derive a future stream of income or services, eg site acquisition, building construction.

(excluding untied grants money paid to the States by the Commonwealth through Financial Assistance Grants, or FAGs), with the balance coming through the States. For the non-government sector the Commonwealth provides about 66 per cent of direct public funding. Another 10 per cent comes through FAGs and the remainder from the States.

Commonwealth involvement in schools funding was a gradual process, starting with Commonwealth grants to government and non-government schools for capital spending on science laboratories and libraries in the 1960s. Between 1964 and 1969 all State governments introduced recurrent grants for non-government schools; this was followed by flat-rate Commonwealth recurrent grants for non-government schools in 1970, aimed at raising standards in the large Catholic sector. In 1974 Commonwealth recurrent funding to non-government schools was significantly increased and was made contingent on assessed need. The same year saw the commencement of Commonwealth recurrent funding to government schools on a per capita basis.⁴⁸

Table 4 shows the Commonwealth/State contribution to government and non-government schools through direct Commonwealth funding, FAGs, and States' own sources for 1995-96 and 1996-97.

Table 4: Estimated Public Expenditure on Schooling: Commonwealth Specific Purpose Programmes & Financial Assistance Grants, & States Own Sources, 1995-96 and 1996-97⁴⁹

	1995-96 (\$ m)	1996-97 (\$ m)	% increase
Government schooling			
Commonwealth Specific Purpose Programmes	1,338	1,393	4.0
Commonwealth FAGs	3,581	3,710	3.6
State and Territory (own source)	5,969	6,498	8.9
Sub-total	10,889	11,601	6.5
Non-government schooling			
Commonwealth Specific Purpose Programmes	1,859	1,977	6.3
Commonwealth FAGs	298	309	2.6
State and Territory (own source)	663	712	7.3
Sub-total	2,821	2,998	7.6
Joint government/non-government⁵⁰			
Commonwealth Specific Purpose Programmes	12	13	7.7
Total	13,721	14,612	6.5

Source: State and Territory Budget Papers, Commonwealth Budget Papers, DETYA records. Figures may not add to total due to rounding.

⁴⁸ DEETYA, *Schools Funding: Consultation Report*, 1997, pp. 15-18.

⁴⁹ Where possible, State and Territory expenditure which does not directly compare to Commonwealth expenditure through the States Grants (Primary and Secondary Education Assistance) Acts has been excluded from expenditure figures.

⁵⁰ This refers to programmes which extend over both sectors in such a way that funds cannot be allocated to sectors individually.

The attribution of FAGs funding to school education is based on the assumption that FAGs funding is spent evenly across all State services.

The figures above show a greater increase in State spending than in Commonwealth spending. It should be noted, however, that these figures are estimates only. Lack of consistency across State and Territory Budget papers makes it difficult to provide definitive funding figures.

2.1.3 Allocation of Commonwealth recurrent funds

Commonwealth General Recurrent Grants are provided to State government education systems as block grants calculated on a per student basis for the primary and secondary school level, based on the number of eligible students enrolled on the schools' census date.⁵¹

In the non-Government sector Commonwealth Recurrent Grants are needs-based. In recent years, the amount schools receive has been determined through the Education Resources Index (ERI). The ERI measures the capacity of non-government schools and systems to generate funding on their own behalf. Under the ERI, non-government schools are assigned to twelve funding categories. Support is provided on a per capita basis with different rates for primary and secondary levels linked to Average Government School Recurrent Costs (AGSRC). With systemic schools (those which are part of a centrally administered system) it is the system, rather than the individual school, which has a funding category. Catholic systemic schools, which provide the majority of non-government places, receive the second highest rate.⁵² The New Schools Policy, operational, with some modifications, from 1986 to 1996, limited the funding level of new non-systemic schools and set minimum enrolment numbers. The policy was abolished in 1996 and a simpler approval process for Commonwealth funding of new and changing schools, relying primarily on State registration, was introduced.⁵³

In May 1999 the Government announced major changes to Commonwealth funding arrangements. Under the new arrangements, which take effect in 2001, funding will be based on the socio-economic status (SES) of school communities. This approach links student addresses with census data to obtain an SES status score for each school. The base level of funding will be 13.7 per cent of AGRC, but schools drawing enrolments from the lowest income communities will receive 70 per cent of AGSRC (as opposed to the current 56 per cent). Those schools which would receive less funding under an SES measure will have their year 2000 funding levels maintained in real terms. Catholic systemic schools (which comprise almost two thirds of all non-government schools) will be funded under these arrangements on the basis of SES scores which essentially preserve the equivalent of their current ERI funding level.⁵⁴

The States use a variety of mechanisms to determine their own funding allocations for government schools. The Catholic education system and other smaller systems use their own mechanisms to assess relative need once they receive their funding from the Commonwealth.

Recent years have seen a drift in enrolments to the private sector, with senior secondary enrolments in non-government schools rising from 33.8 per cent of the total number of full-time senior

⁵¹ The census date for the collection is the first Friday in August each year.

⁵² DEETYA, *Schools Funding: Consultation Report*, p.31. The Report gives an in-depth examination of the ERI. The great majority of systemic schools belong to the Catholic system.

⁵³ *Ibid*, p. 22.

⁵⁴ DEETYA, *Budget 99*, items dealing with non-government school funding.

secondary students in 1990 to 36.7 per cent in 1998.⁵⁵ To avoid cost-shifting by the States as the balance shifts between public and private schools, the Commonwealth introduced the enrolment benchmark adjustment, which deducts an amount per student from public schooling when the proportion of students in non-government schools increases compared to the proportion in government schools.⁵⁶ No distinction is made between levels of schooling.

2.1.4 Levels of recurrent grants

General Recurrent Grants account for around three quarters of Commonwealth outlays on schools. The 1998 final rate for government secondary schools was \$585 per student. For non-government secondary schools, grants varied from a low of \$832 per student to a high of \$3,560 per student.⁵⁷ Under the new arrangements based on the socio-economic status of school intakes, funding in 1998 dollars is estimated to range from \$829 to \$4,235 per secondary student.

2.2 Vocational Education and Training

2.2.1 Contestability of the market

Historically, government funding has gone to public providers. In recent years, however, the adoption of competitive tendering for the delivery of VET programmes and User Choice (of public or private provider) for commencing apprentices and trainees has led to an increased proportion of government funds going to private providers. Private providers' share of the market rose rapidly between 1996 and 1997 and is expected to continue to increase. Further details are given below in Sections 2.2.5 and 2.2.6.

2.2.2 Commonwealth and State outlays

The great majority of outlays on the public VET system come from governments (82 per cent in 1997). Within this figure, State funding is dominant. However, as Table 5 shows, there has been a substantial increase in Commonwealth VET recurrent funding over recent years.

The Commonwealth provides funding to ANTA for allocation to States to support a national VET system. ANTA was established under the *Australian National Training Authority Act 1992*, following an agreement by Heads of Government to establish a national focus for VET with strong industry input. The ANTA Board supports a Ministerial Council comprised of the relevant Commonwealth and State Ministers.⁵⁸

⁵⁵ ABS, *Schools Australia 1998*, No. 4221, Table 22, p. 31 and *Schools Australia 1990*, Table 6, p.25.

⁵⁶ The enrolment benchmark adjustment (EBA) is calculated at the end of each year following the student census to determine the actual drift in student enrolments in a State. The calculation involves using actual average expenditure by a State on students in government and non-government schools. Actual enrolment proportions for each State are used rather than a national average. Therefore, if the census shows an increase in the non-government school enrolment share for a particular State, this is translated into a notional saving to that State and 50 per cent of that amount is deducted from the Commonwealth grants to that State. If the census shows no change in relative enrolment shares, or an increase in the government share, the EBA is not triggered. The EBA mechanism also includes a buffer arrangement to protect States from minor adjustments to the proportion of non-government student enrolments.

⁵⁷ DEETYA, *Programmes 1998-99*, pp. 30, 33.

⁵⁸ Details of the roles and responsibilities of the ANTA Ministerial Council, the ANTA Board, State training agencies and DETYA are given in the *Australian National Training Authority Agreement for 1998-2000*.

A revised ANTA Agreement was endorsed by Commonwealth and State Cabinets in 1998. Under the new Agreement, State Ministers for VET agreed to achieve growth in their VET systems through efficiencies and, in return, the Commonwealth agreed to maintain funding in real terms (\$904m in 1998) for three years. The revised Agreement was developed against a background in which Commonwealth funding for VET has increased 37 per cent in real terms since 1992. This additional funding has been put towards growth in the sector, with a focus on increasing places for young people. Prior to the new Agreement, States had agreed to maintain effort at 1994 levels and Commonwealth funds were provided to support growth in the system.

The table below shows public recurrent funding for VET between 1994 and 1997. It excludes funding for employer incentives and Commonwealth national programmes for VET.⁵⁹

Table 5: Public recurrent funding for VET, 1994-1997

Year	Commonwealth		State		Total
	\$ million	% of total	\$ million	% of total	\$ million
1994	430	19	1,851	81	2,281
1995	548	23	1,868	77	2,416
1996	622	24	1,942	76	2,564
1997	731	27	2,004	73	2,736

Source: ANTA Annual National Report, 1994, p. 27, 1995, Vol. 1, p. 34, 1996, Vol. 1, pp. 50-51 and 1997, Vol 1, p. 52.

2.2.3 Commonwealth programmes

The Commonwealth contributes to VET funding through the Training Reform Programme and through ANTA. An overview of Commonwealth funding is provided in Table 6. Note that the figures below include Commonwealth funds provided for capital works, recurrent costs, national programmes and ANTA operating expenses. Funding for employer incentives and wage subsidies has not been included.

Table 6: Commonwealth VET funding, 1994-95 to 1997-98

Year	Training Reform Programme	ANTA Programmes
	\$ 000	\$ 000
1994-95	75,900	843,000
1995-96	79,000	869,000
1996-97	66,000	956,000
1997-98	57,100	1,006,000

Source: DEETYA, *Annual Reports, Programmes*, 1994-95 to 1997-98.

⁵⁹ There are three main financial collections in the VET sector. These are the ANTA Annual National Reports, Directions and Resource Allocations Reports to the Ministerial Council, and the Australian Vocational Education and Training Management Information and Statistical Standard (AVETMISS) collections. AVETMISS data is published annually in the NCVER publication *Australian Vocational Education and Training Statistics*. The AVETMISS collection has a broader scope than the ANTA documents. The most recent Annual National Report is for 1997.

2.2.3.1 The Training Reform Programme

In 1997-98 activities covered under the Training Reform Programme included Training Policy and Innovation, Entry Level Training and Skills Enhancement, New Apprenticeships and the Workplace English Language and Literacy (WELL) Programme. Training Reform Programme funds are allocated by a variety of methods, including competitive tendering. Funds were not provided for course delivery except in the case of the Access Programme and the WELL programme.

2.2.3.2 The ANTA Programme

Under this programme, the Commonwealth provides funding to ANTA for allocation to States to support a national vocational education and training system and to support national projects, national programmes and ANTA's operational costs.

2.2.4 Allocation of funds to training activity through ANTA

Commonwealth and State Ministers of VET agreed in May 1997 to new planning and accountability arrangements for the national VET system. These continue to give a strong role to industry involvement. The new arrangements involve a *National Strategy for VET*, an Annual National Priorities document and State Annual VET Plans (formerly State Training Profiles).

Industry Training Advisory Boards at the State level advise State Training Authorities of the appropriate needs of industries which are then aggregated and prioritised. State training needs are then presented to the ANTA Board in the form of Annual VET plans. These Plans report on progress against national objectives and annual national priorities and include details of the distribution of VET activity to be achieved annually, by industry sector and the level of training.

The Annual VET Plans are considered by the ANTA Ministerial Council, acting with the advice of the ANTA Board. Commonwealth funds are allocated to the States by ANTA after agreement to the Plans by the ANTA Ministerial Council.

Funds provided by the Commonwealth through ANTA to States on the basis of the Annual VET Plans are primarily allocated to provide training places in public and private sector VET providers. The Commonwealth also allocates around \$70m per year to ANTA's National Programmes. These funds support Industry Training Advisory Bodies, Group Schemes, Adult and Community Education projects and development of Training Packages.

State Training Authorities allocate public resources directly to public providers and through various contestable arrangements (including User Choice) for the delivery of training.

2.2.5 Competitive resource allocation

One of the aims of the national vocation and training system is to encourage the development of an effective and competitive training market.

In recent years all States have increased the proportion of funding allocated to competitive processes. This has meant that TAFE and other registered providers, such as community-based providers and private providers, can now access funding on a competitive basis to deliver some VET programmes.

In 1997, the States allocated \$153 million to competitive activities, including competitive tendering, fee for service activities and preferred supplier arrangements. This was an increase of more than 40 per cent on 1996 (\$108 million). In 1998, an estimated \$198 million was to be allocated on a contestable basis. These funds do not include funds to be applied by States in the implementation of User Choice.

The programmes for competitive tendering and preferred supplier arrangements are decided by the States. Preferred supplier arrangements are an extension of competitive tendering and are awarded to a provider to provide training on a longer term basis.

Table 7 shows the estimated amount spent by States on competitive activities as a proportion of total VET operating payments and cash transactions for 1996-98.

Table 7: Funding allocated to competitive activities: estimated amounts 1996-1998

Year	Estimated amounts	% of total	Recurrent receipts from government ⁶⁰
	\$ million		\$ million
1996	108	4.2	2,564
1997	153	5.6	2,736
1998	198	7.5	2,653

Sources: ANTA, *ANTA Annual National Report*, Vol. I, 1996, p. 17; *Vocational Education and Training: Directions and Resource Allocations for 1997: Report to the Ministerial Council*, p. 13; and 1998, pp. 13 and 37.

2.2.6 User Choice funding

User Choice is a funding arrangement for off-the-job training for New Apprenticeships that aims to make the VET system more responsive to the needs of its clients by encouraging a more direct market-like arrangement between individual providers and clients. The provider chosen by the client may be from either the public or the private VET sector. Public funds are then allocated to this provider.

States have the responsibility for implementing User Choice. All States have now basically agreed to the implementation of User Choice for off-the-job training for commencing apprentices and trainees (NSW limits choice of provider for apprentices in selected areas and trades). In May 1997, Commonwealth and State Ministers of VET agreed to a Statement of User Choice Policy including Common Costing Principles. A National Evaluation of User Choice in New Apprenticeships commenced at the beginning of 1998. The amount of funds allocated for User Choice in 1998 was dependent on the number of apprentice and trainee commencements (total apprenticeship/traineeship training represents about 20 per cent of publicly funded VET).

⁶⁰ Figures exclude ANTA and other Commonwealth Specific Programmes.

2.3 Higher Education

2.3.1 Contestability of the market

Higher education institutions outside a legislatively designated list do not receive operating grants from the Commonwealth.

2.3.2 Commonwealth and State outlays

The publicly funded higher education system comprises 43 institutions, of which three are funded by Commonwealth Departments other than DETYA.⁶¹ Data below relate to institutions which receive operating funding from DETYA. Private institutions are not required to report statistical data and are outside the scope of DETYA data collection. The Commonwealth has been responsible for higher education funding since 1974.

2.3.3 Allocation of Commonwealth funds

Most Commonwealth higher education funding is provided in the form of a single block operating grant which institutions allocate in accordance with their agreed educational profile.⁶² The profile is an agreement between the Commonwealth and the university which defines the institution's broad mission and specific goals as a basis for allocation of resources and assessment of performance. Two enrolment targets are specified in the profiles:

- a total load target, defined in terms of EFTSU; and
- an undergraduate load target, defining the minimum load (EFTSU) to be allocated to undergraduate students in a given year.

In 1998 \$5.5 billion went to operating grants. The grants included the following components:

- a teaching related component of approximately \$4.4 billion;
- a research component known as the Research Quantum (\$219 million); and
- a capital component (\$260 million).

Allocation depends on the discipline and level of study mix at the time of the Commonwealth's 1990 Relative Funding Model study and the growth allocated since 1991. The Model, which sets weightings for student load, was a one-off measure to equalise the funding base between institutions (see Attachment A). Input into the Model included three empirical studies of expenditure in a number of higher education institutions covering salaries (minus a research component for academics), equipment and central services but excluding research expenditure. Since then a number of institutions have negotiated load shifts but these have not been reflected in their operating grants.

⁶¹ The institutions which receive their main operating funds from other portfolios are the Australian Film, Television and Radio School, the National Institute of Dramatic Art, and the Australian Defence Force Academy.

⁶² Discussion of government funding for higher education is based on DETYA unpublished statistics; DEET, *National Report on Australia's Higher Education Sector*, AGPS, 1993, pp.84-87 and Industry Commission, and Industry Commission 1997, *Industry Commission Submission to the Review of Higher Education Financing and Policy*, Appendix 2. Operating grants cover basic operating costs such as salaries and library resources.

- The Relative Funding Model allocated weightings ranging from 1 for the lowest cost undergraduate courses (accounting, administration/economics, law and other humanities) up to 2.7 (for agriculture, dentistry, medicine and veterinary science) for undergraduate courses. Weighting for postgraduate courses ranged from 1.4 to 4.7 for a research degree in a high-cost course.
- The base figure for students in the lowest cost courses mentioned above is estimated at \$6,250 for 1997.

Where additional places have been provided in a particular year, funding is allocated to cover their 'pipeline' effect in the three succeeding years.⁶³ In any given year, the teaching related component of an institution's operating grant is essentially the sum of: the previous year's grant; the 'pipeline' effect of previous growth allocations; additional growth provided in the current year; and adjustments arising from agreed changes to its total load target or to its disciplines and levels of study.

In 1997, additional student places, ie growth, were funded at \$9,638 per EFTSU including a capital roll-in component of \$622.

From 1998, a number of changes have affected enrolment of above load students (those in excess of the level agreed on in the university's profile) and below load students (enrolments below the level agreed on in the profile). These involve the provision of marginal funding for over-enrolment of undergraduates and the recovery of marginal costs for under-enrolment under certain conditions, as well as penalties for enrolling fee-paying students in HECS liable places.⁶⁴ Provision for over-enrolment is intended to allow institutions with low marginal costs and the willingness to accept marginal funding to offer additional places to undergraduate students without charging fees.

The Review of Higher Education Financing and Policy (the West Review) was charged with undertaking a broad ranging review of Australia's higher education sector. Within this framework, the review committee addressed options for university funding. The Committee presented its final report to the Government in April 1998. The report, *Learning for Life*, put forward student-centred funding as a key change, calling for public funding to be driven by student choices rather than negotiated between DETYA and the universities. The report also urged greater consistency of

⁶³ The 'pipeline' formula applying to an additional place is 1.0 of the rate of funding/EFTSU in Year 1, 0.75 of the rate in Year 2, (0.75* 0.75) of the rate in Year 3 and (0.75*0.75*0.75) of the rate in Year 4; that is, institutions are funded as if they had 75 per cent of the number of Year 1 students in Year 2, 75 per cent of Year 2 students in Year 3, etc.

⁶⁴ The conditions are as follows: Where an institution enrolls more undergraduate students on a HECS liable basis than the number of Commonwealth funded undergraduate places, the Commonwealth pays \$2,517 in 1998 for each HECS liable undergraduate place (in EFTSU) above the number of Commonwealth funded places *provided that* the institution has filled its total number of Commonwealth funded places, net of any over-enrolment at the undergraduate level. That is, an institution must fill *both* the number of Commonwealth funded undergraduate places and the total number of Commonwealth funded places before it receives a benefit from over-enrolling undergraduate students. Where an institution does not fill its Commonwealth funded (or HECS liable) undergraduate places nor the total number of Commonwealth funded places, the Commonwealth recovers from the institution \$2,517 (in 1998) for each Commonwealth funded undergraduate place that it did not fill. If there are any domestic postgraduate students enrolled in fee-paying places counted within the total number of Commonwealth funded places, the Commonwealth also recovers from the institution \$2,517 for each of these places. If the institution has also enrolled domestic undergraduate students in fee-paying places the Commonwealth recovers \$9,000 for each fee- paying student (in EFTSU) who could have been offered a HECS liable place, in addition to the \$2,517 that may have already been recovered in respect of these places.

funding arrangements between VET and higher education, while affirming the distinctive mission of the institutions which belong to the two sectors.⁶⁵

SECTION III: UNIT COSTS

This section of the paper provides broadly approximate recurrent unit costs for each sector derived from data collection for that sector. Each sector uses different assumptions, definitions, source data and methodology in establishing per capita costs, and further research would be needed to identify areas of commonality and difference with more precision. Comparisons across sectors should therefore be treated with caution. Senior secondary schooling costs are particularly difficult to estimate as most systems do not have separate figures for expenditure at the senior secondary level. For the publicly funded VET sector, annual costings based on equivalent full-time student units (EFTSU) are particularly problematic as there is no national position on the quantity of effort which constitutes an EFTSU. No information is available on unit costs of private provision of VET. These caveats should be borne in mind in using the information below.

The difference between the unit cost and the amount (if any) recovered from the student, ie. the extent of subsidy which the student receives, is dealt with under Section V on subsidies. Universities' research costs have been excluded where data permit.

Cost estimates for each sector and the methodology involved in reaching these estimates are given below.

3.1 Senior secondary costs

Figures below give broadly indicative estimates of per capita recurrent expenditure for different levels of government and non-government schools.

3.1.1 Government schools

Reporting on school expenditure is divided into in-school and out-of-school costs. In-school costs are allocated to primary and secondary education. Out-of-school costs, which include the cost of State Education Departments, are provided for the education system as a whole.

Senior secondary in-school expenditure has been estimated through apportionment for those states which do not have separate senior secondary institutions.⁶⁶ The apportionment was derived from teacher-student ratios based on standard form allocation for teaching staff.⁶⁷ Given that in most cases data on actual expenditure is lacking, the apportionment method can provide only a broad approximation of actual costs.

⁶⁵ The Committee's views are set out in DEETYA, *Learning for Life: a policy discussion paper*, AGPS, 1997 and DEETYA, *Learning for Life: final report*, J S McMillan Printing Group, 1998.

⁶⁶ The ACT, the Northern Territory and Tasmania operate separate senior secondary institutions and reported actual expenditure.

⁶⁷ The apportionment was carried out by calculating relative weighting of junior and senior secondary student teacher ratios and obtaining weighted student enrolments. These were applied to total secondary enrolments to obtain a percentage for apportionment (varying between states). Salaries expenditure was allocated for all in-school staff using these percentages. In the case of in-school non-salary recurrent expenditure, actual figures were reported where available; otherwise, the percentages were used. Similarly buildings and grounds expenditure was reported on an actual basis where possible. Where this was not possible, apportionment was based on estimated use of the facilities.

For 1997-98, senior secondary in-school expenditure was around \$1,769m on staff salaries and allowances and other operating expenditure, \$96m on buildings and grounds; and \$147m on superannuation, a total of \$2,012m.⁶⁸ Out-of-school costs for the whole government education system totalled \$754m, of which \$11m was for buildings and grounds and \$45m was for superannuation. Except for a small rental component, expenditure on buildings and grounds consists chiefly of capital expenditure. It does not represent all capital expenditure, but rather net expenditure offset by revenue arising from sale of sites.

The present calculation focuses on salaries, other operating expenditure and superannuation as representing the closest equivalent obtainable to recurrent costs.

The figure for costs is on a financial year basis. Student numbers are collected on a calendar year basis. To obtain senior secondary figures for 1997-98 the sum of student numbers in government senior secondary schools in 1997 and for 1998 has been divided by two, giving a figure of 252,362 full-time equivalent students.⁶⁹ A similar process has been followed to obtain the total numbers of students at all levels.

Estimates of in-school unit costs for senior secondary school have been derived by dividing expenditure by the number of students in senior secondary school. Out-of-school costs have been obtained by dividing expenditure by the total number of students in government schools at all levels. The building and grounds component has not been included in either category as it is largely capital in nature.

Table 8: Per capita estimates of senior secondary operating costs in government schools, 1997-98

Category	\$
In-school expenditure	
Salaries, allowances & other operating expenditure	7,011
Superannuation	584
Sub-total	7,595
Out-of-school expenditure	336
Total	7,930

Source: Derived from MCEETYA, *National Schools Statistics Collection*, 1997.

The estimate of \$7,595 per capita for senior secondary in-school expenditure compares with in-school per capita expenditure of around \$6,397 for secondary students as a whole, a differential of around 19 per cent. If out-of-school costs are included the differential is around 18 per cent. Inclusion of expenditure on buildings and grounds would bring estimated per capita total expenditure for senior secondary students to \$8,314. Some state systems report capital expenditure under a certain threshold under other operating expenditure; if this component were excluded from

⁶⁸ Figures have been rounded to the nearest million. These and following figures on government school costs come from or have been derived from MCEETYA, *National Schools Statistics Collection*, 1997. Expenditure on buildings and grounds includes building construction and acquisition, including grounds development; site acquisition; and rentals. Rental costs form under 1 per cent of these costs.

⁶⁹ ABS, *Schools Australia*, 1996 and 1997. The full-time equivalent of part-time students has been included in this figure.

the calculation the figure for recurrent costs in government schools would be slightly lower. DETYA does not hold data which identifies this component.

Little work has been done on costs for different learning areas in schools, but a recent study which calculated the teacher-related annual costs for senior secondary classes in Victoria gives the average cost per student for a class as \$540. The lowest cost class was Mathematics, at \$451. Costs for languages other than English were \$1,107.⁷⁰

3.1.2 Non-government schools

Non-government school expenditure is reported in a different way from government school expenditure. Figures are collected on a calendar year rather than a financial year basis, and the In-school/Out-of-school categorisation is not used. Superannuation is included, but no separate figure for superannuation costs is available. Spending is divided into recurrent and capital; the latter does not equate precisely with the buildings and grounds category for government schools, which covers net expenditure offset by revenue arising from sale of sites rather than total expenditure.

Another factor which tends to vitiate any comparison of capital spending between non-government and government schools is that whereas the former use a \$500 threshold in recording capital expenditure, the latter employ varying thresholds (depending on the State) of between zero and \$250,000. A number of other differences in the recording of capital expenditure further complicate comparisons.

In the case of systemic schools, recurrent expenditure includes some expenditure on the system's overall administrative costs (the great majority of Catholic schools and a small minority of independent schools are systemic). The Commonwealth allows system authorities to use up to 2 per cent of their total Commonwealth general recurrent funding for system administration purposes.

Given these differences in expenditure categories, there are substantial difficulties in comparing unit costs for the government and non-government schools. These should be borne in mind in looking at the figures below.

Per capita recurrent expenditure in non-government secondary schools was \$5,519 for Catholic schools and \$7,538 for independent schools in 1997.⁷¹ The figures are averages and variations between individual schools may be substantial.

If the differential between senior secondary recurrent costs and overall secondary recurrent costs in non-government schools were broadly of the same order as in government schools, ie in the vicinity of 19 per cent, costs would be around \$6,600 per senior secondary student in Catholic secondary schools and \$9,000 per senior secondary student in independent secondary schools.⁷²

⁷⁰ Shah, Chandra, 'Recurrent teacher cost per student by key learning area: upper secondary schools, Victoria, Australia', *Education Economics*, Vol. 6, No. 2, 1998, pp. 121-139.

⁷¹ Unpublished figures, DETYA. Expenditure includes expenditure of funds raised through fees or obtained from church or parish grants; either expenditure on or allowance for superannuation and long service leave; Commonwealth and State grants for education; and payments to staff of salary-related allowances. It excludes direct payments by the Commonwealth and States to students and/or parents and salaries of staff and operating expenses of the boarding house components of schools.

⁷² Details on the basis for the estimate of government senior secondary costs are given in Section 3.1.1 above. Non-government costs are estimated for secondary schools only and do not take account of students in combined primary/secondary schools.

3.2 Vocational Education and Training costs⁷³

ANTA has been concerned to develop reliable methods of calculating unit costs in relation to the provision of government funded VET programmes and associated infrastructure, and is working on refining the calculation of unit cost. No information is available on costs for private providers of VET.

Building on earlier work, ANTA's Performance Review Committee has developed a series of Key Performance Measures that broaden existing measures to focus on both efficiency and effectiveness. In 1997 Ministers approved two new measures of efficiency: actual public expenditure per publicly funded output and actual public expenditure per total recognised output. To support this, research is currently under way to investigate whether it is possible to replace Annual Hours Curriculum with a more appropriate measure of output.

Until a new standardised measure of output for the sector is fully introduced, Ministers have agreed that government recurrent expenditure per public annual curriculum hour will remain the key performance measure used to assess the unit cost of providing Australians with publicly funded vocational skills. (VET expenditure financed from student fees and charges is counted as government expenditure). This measure involves calculating recurrent costs per annual hour curriculum notionally delivered, with hours adjusted for confirmed invalid module enrolments.⁷⁴ Annual hours are based on the standard curriculum hours for each module (subject) when the module is undertaken in standard supervised delivery mode.

Unit costs per hour are based on dividing expenditure by annual hours. For 1997, this involved dividing recurrent expenditure of \$2,578m by 226,096 hours, giving an average cost of \$11.40 per hour for 1997.⁷⁵ For the purposes of this calculation, expenditure excludes superannuation, payroll tax, grants and subsidies provided to employers and individuals as incentives to undertake training, ANTA operating revenue, revenue derived from fee-for-service activities, and revenue from Commonwealth Specific Programmes, and revenue from the Commonwealth VET in Schools programme. The figures show 'whole of system' costs, which include not only provision of training but regulation and quality assurance of training, as well as the facilitation of training arrangements in industry. They include expenditure on State training authorities. Many of the functions covered under this expenditure do not have an equivalent in the higher education sector. VET sector data collection does not provide for identification of expenditure associated with State bureaucracies.

⁷³ ANTA has argued that a comparison of the average unit costs of VET delivery with the average costs of higher education delivery at the undergraduate level is problematic without a detailed analysis of the cost implications of the education and training services offered, enrolment patterns and teaching and learning practices (ANTA Response to *Learning from Life* Discussion Paper, p. 17). It would appear that such analysis might be necessary to justify the level of cost in each sector, but it is less clear that the analysis is a prerequisite to presenting the differences. The 1996 ANTA *Annual Report* published comparative unit costs across the three sectors based on a full-time load of 720 hours; however, a figure for the full-time estimated cost of VET was not published in the 1997 ANTA *Annual Report* because of concerns about a valid methodology for unit cost comparisons. It is accepted that there are methodological difficulties in comparing costs between VET and higher education: these include the absence of a common measure of student load and some differences in the basis of calculation of cost relativities for VET and higher education. A further difficulty is that in addition to measuring the cost of provision of training (the largest single expense), ANTA unit costs include costs associated with the regulation and quality assurance of training and the facilitation of training arrangements in industry.

⁷⁴ The figure is notional because it does not represent the number of hours actually delivered; for example, it takes no account of competency-based training, which may take either less or more time than the 'notional' number of hours. It also attributes hours to modules credited through Recognition of Prior Learning (these are discounted according to a set formula).

⁷⁵ See ANTA, *Annual National Report 1997*, Vol. 3: *Measuring the Performance of Australia's Vocational Education and Training System*, p. 82.

The *National Overview* volume of the ANTA *Annual National Report* gives operating expenditure for 1997 as \$3,868m.⁷⁶ The difference between this figure and that given above for unit cost purposes lies in the inclusion of the categories listed as exclusions in the paragraph above; the fact that expenditure was calculated on an accrual basis whereas that for unit costs was calculated on a cash basis; and residual differences in the scope and boundaries of data collection. Unit costs would obviously be higher if the higher figure for expenditure were used.

If a full-time load is taken to be 720 hours and the hourly cost is \$11.40, then a broad estimate of the cost to governments for a full-time student would be around \$8,200 for 1997.⁷⁷ As indicated above, this figure excludes superannuation costs (of around \$450 per capita) but includes overheads costs such as the expenditure of state training authorities. In a comparison of costs in the different sectors undertaken in 1996, ANTA used 720 hours to derive annual unit costs for the publicly funded VET sector. The comparison was not repeated in 1997 because further research by ANTA on the ranges of potential costs resulted in too great a degree of technical complexity for inclusion in the report. A further problem was the lack of any agreement at the national level on what constitutes a full-time load.

NCVER's electronic information system derives full-time participation using 75 per cent of the notional full-time effort measured as 720 hours per year, ie 540 hours. If this figure were taken as the basis for calculating annual recurrent costs, costs would be around \$6,150. In actual practice, there is no standard number of hours for a full-time year-long course in VET: hours vary between institutions and courses.

Neither a load of 720 hours or one of 540 hours reflects typical VET experience. Fewer than 10 per cent of students take more than 540 hours. If the hourly unit cost of VET is multiplied by the average curriculum hours per student in a given year (198 hours in 1997), this would result in an estimated cost to the government for each student of under \$2,300.⁷⁸

As input into benchmarking and Key Performance Indicators, States have continued to refine delivery cost relativity data for the occupational groups and levels of training classifications used in State Annual VET Plans. In addition to measures of unit cost for the publicly funded VET system overall, ANTA has developed national cost relativities which were applied to the estimated 1996 annual hours curriculum (from State Training Profiles) to determine the course-mix weightings for each State. The index of national cost relativities is set out Table 9 below.

The index shows that costs vary significantly between courses, with automotive, utilities, and engineering and mining courses the most expensive, and finance, banking and insurance the least expensive. If the average figure of \$8,200 is taken as the base for weighting purposes, the cost of an automotive course would be \$10,640 and of an engineering and mining course \$10,496. The cost of finance, banking and insurance courses would be \$5,576. It should be borne in mind that these figures are national aggregates only and that costs differ significantly within and between particular State jurisdictions.

⁷⁶ ANTA, *Annual National Report 1997*, Vol. 1, *National Overview*, pp. 44-45.

⁷⁷ ANTA, *Annual National Report 1996*, Vol 3: *Benchmarking VET: the Performance of the Vocational Education and Training Sector in 1996*, p. 48, pp. 67-69; *Annual Report 1997*, Ch. 8, 'The Public Investment in Training Australians'. It should be noted that under this definition of full-time, VET courses appear to be more resource-intensive in terms of contact hours than universities. Sampling of contact hours in different higher education courses indicates that full-time courses in particular institutions range from over 600 hours per year for first year nursing and science to under 300 hours for law.

⁷⁸ For proportion of students undertaking different loads see NCVER, *Australian VET Statistics 1997*, p. 26.

Table 9: Index of national VET cost relativities for occupational training courses, 1996

Training area	Weight
Arts, entertainment, sport & recreation	1.03
Automotive	1.33
Building & construction	1.16
Business & clerical	0.79
Communications	1.16
Community services, health & education	0.91
Computing	0.84
Engineering & mining	1.28
Finance, banking & insurance	0.68
Food processing	1.14
General education & training	0.85
Primary industry	1.12
Process manufacturing	1.16
Sales & personal service	0.94
Science, technical and other	1.06
Textiles, clothing & footwear, & furnishings	1.18
Tourism & hospitality	1.10
Transport & storage	1.20
Utilities	1.29

Source: ANTA, *Annual National Report, 1997, Volume 3: Benchmarking Vocational Education and Training*, p. 81.

Work on Key Performance Measures has been a catalyst for collaborative research by States and the Commonwealth into some key elements of the cost of providing VET. Data on cost elements such as the ratio of student hours to teacher hours, teaching salaries and available teaching hours are being extracted by the States.⁷⁹

The issue of cost of course delivery is an extremely sensitive one in VET, in part because with the development of user choice and competitive tendering an institution's costs may constitute commercial-in-confidence information.

3.3 Higher education costs

It has not been possible to calculate higher education costs through dividing total expenditure by student load, as expenditure figures do not disaggregate expenditure devoted to undergraduate teaching, postgraduate training, research, or fee-for-service activities. The figure used has been based on government total operating grants for undergraduate education. These include HECS.

The estimated average cost of an undergraduate higher education place in 1997 was around \$9,300. This was calculated by taking operating grants in 1997 for undergraduate education adjusted for one-off payments and advances and excluding the Research Quantum, Indigenous Support funding, and the capital roll-in; dividing by the total 1997 actual load for undergraduate EFTSUs adjusted to targets; and rounding to the nearest hundred. Institutions covered are those listed in Table A of the

⁷⁹ ANTA, *Annual Report Vol 1: National Overview, 1996*, p. 41.

Higher Education Funding Act excluding Batchelor College and the Australian Maritime College. Average per capita funding per undergraduate EFTSU for the capital roll-in for 1997 was \$579.

The most widely accepted method of computing unit costs for particular courses in higher education is the Relative Funding Model (see Attachment A) taken in conjunction with the base cluster figure of \$6,250 for 1997. Results based on this approach are given in Table 10.

Table 10: Unit costs of course delivery for different university undergraduate courses, 1997

RFM band	Courses	Teaching unit costs	Cost as % of highest cost course
1	Accounting Economics Law Other humanities	6,250	37
2	Behavioural science Education Mathematics Other social sciences	8,125	48
3	Computing Nursing Other built environment Other health Other languages Visual & performing arts	10,000	59
4	Engineering Science Surveying	13,750	81
5	Agriculture Dentistry Medicine Veterinary science	16,875	100

Source: DETYA figures.

At the postgraduate level, the estimated costs range from \$12,500 to \$29,375 for research degrees and from \$8,750 to \$18,750 for other postgraduate qualifications.

It should be borne in mind that these figures are notional and do not represent the cost of course delivery in any one institution. Data for the Relative Funding Model was derived from sample data gathered in teaching cost studies in the late 1980s modified by judgements about the appropriate spread of costs. It has not been updated to reflect developments since 1990 in areas such as the increased use of information technology in many university courses. Actual expenditure on course delivery may be higher if a university cross-subsidises courses with income from sources other than Commonwealth grants, or lower if a university uses teaching funds to cross-subsidise research.

ANTA has suggested that unit costs per hour be estimated for the higher education sector to enable comparability with the methodology adopted in the VET sector. This is rendered difficult by the fact that higher education data collection does not include a measurement of contact hours. A selection of course listings from a number of university handbooks indicate that most higher education courses appear to involve substantially fewer contact hours in lectures, tutorials, seminars, laboratory and practical work than in VET. While science involves the most hours (an average of 24 hours per week over a three year degree), law involves the least (10 hours per week). Most involve around 16-17 hours per week in a 26 week year, ie an average of around 430 hours per year. This would give an average cost of somewhat under \$22 per hour. It should be stressed, however, that figures for contact hours are based on a small number of courses at a small number of universities and are not statistically reliable.

3.4 Overall costs across sectors

A different perspective on this topic is given by the work of Gerald Burke on expenditure on education and training. He estimates on the basis of 1996 figures (1995-96 for government schools) that public outlays for government senior secondary schooling are around \$16,000; for a university business course, around \$19,000 and for a medical course around \$104,000; and for a VET Traineeship around \$2,000, compared to around \$12,000 for an Advanced Diploma in Accounting and close to \$14,000 for an 'engineering' apprenticeship. Government schooling estimates include buildings and grounds and superannuation. Estimates for VET exclude capital outlays and outlays for superannuation. Higher education costs include capital outlays of approximately 5 per cent of total outlays. All figures cover the whole course and are not on a per annum basis. Employer subsidies represent additional public costs in the case of apprenticeships and traineeships.⁸⁰

SECTION IV: COSTS OF EDUCATION AND TRAINING TO INDIVIDUALS

4.1 Conceptual and empirical considerations

To the student, the *gross direct costs* of education and training comprise total expenses incurred specifically for purposes of education and training. Important components of gross direct costs are: fees and other contributory charges for education or training; and expenditure on books, stationery, equipment and travel resulting from education or training. The subsistence costs students incur during education and training are normally excluded from these direct costs, on the grounds that individuals incur subsistence costs irrespective of whether they undertake education or training.

A student's *net direct costs* of education and training comprise her or his gross direct costs minus any subsidies paid to the student for purposes of education or training. These subsidies may be provided in the form of grants, scholarships or loans; may derive from public or private sources; and should include any payments for purposes of subsistence (even though, as noted above, subsistence costs are not normally considered to comprise education or training costs proper), since such payments reduce the cost of education and training to the individual.

⁸⁰ See Burke, *Expenditure on education and training: estimates by sector and course*.

A student's *total costs* of education or training comprise her or his gross direct costs plus her or his earnings foregone during the course of education or training.⁸¹

Current data limitations make it difficult to derive estimates of students':

- expenditure on books, equipment and travel resulting from education or training;
- financial supplementation from private sources, eg family, for purposes of education or training; and
- earnings foregone.⁸²

Thus, from the perspective of students this paper focuses upon:

- the component of student costs comprising fees and any other contributory charges;
- the public subsidies the student actually receives; and
- the public subsidies implicit in the prices the student pays.

This section deals with student fees and other contributory charges, including HECS. Public subsidies to students will be treated in Section V.

4.2 Fees and charges payable by students

4.2.1 Senior secondary schooling

Institutional fees and charges may be divided into tuition fees and supplementary fees and charges. While no tuition fees are payable in government schools, administration fees, subject levies, and 'voluntary contributions' may be charged.⁸³

The costs to parents of fees and levies paid to government schools for equipment, materials, activities and services associated with participation in the standard school programme has been estimated on average at around \$200 per student per annum.⁸⁴ This excludes voluntary contributions and the additional private costs associated with uniforms, school camps, and special excursions and events. The Brotherhood of St Laurence has estimated that parents pay about \$800 a year in contributions and levies for a secondary school student.⁸⁵ No breakdown is available for student costs at the senior secondary level in government schools.

Students at non-government schools pay varying levels of fees depending on the school and may also pay other charges such as building fund levies. Non-government secondary schools received on average \$1,838 per student from fees and charges in 1997, as well as \$374 per student in private donations and income. In Catholic secondary schools the average amount received was \$1,533 per

⁸¹ Brian Bentick has estimated that foregone earnings form two thirds of the total cost of university study for the majority of students in the higher education sector ('Rethinking HECS: its Definition and Fiscal Role', p. 8).

⁸² The ABS publication *Student Finances, Australia, 1991* (Cat. No. 6550) gives figures for tertiary student expenditure disaggregated to the level of academic/transport/residential/personal and other costs, but does not break these down into eg. travel expenditure resulting from education and training. The survey found that around 21 per cent of tertiary students depended mainly on family and other sources for income; 47 per cent depended on wages, salaries and investments; and 32 per cent on government and other benefits.

⁸³ South Australia has compulsory fees for students at government schools, of up to \$154 for primary school students and up to \$205 for secondary school students. Western Australia has proposed a compulsory fee of \$235 per year for high school students for materials and excursions.

⁸⁴ Australian Senate Employment, Education and Training References Committee, *Not a Level Playground: the private and commercial funding of government schools*, 1997, p.18.

⁸⁵ Brotherhood of St Laurence submission to the Senate inquiry footnoted above.

student (plus \$337 per student in private donations and income) and in independent secondary schools it was \$4,508 per student (plus \$696 per student in private donations and income). Fees and charges met around one quarter of total costs per student in Catholic secondary schools (28 per cent of recurrent costs) and around half of costs in independent secondary schools in 1996 (60 per cent of recurrent costs).⁸⁶ Tuition fees for Years 11 and 12 tend to be above the average, with fee increases in independent schools ranging from \$100-\$200 to several hundred dollars.⁸⁷

4.2.2 Vocational Education and Training

VET courses range from short modules of just a few hours or a few days duration to extended courses which may last for two or three years. The great majority of VET students study part-time; under 10 per cent of VET students in publicly funded vocational programmes took more than 540 hours of courses in 1997. Average student load was 198 hours; over a third of students took less than fifty hours of courses.⁸⁸

Data on enrolments and completions must therefore be considered on a different basis from the full year of study which is the reference point for schools and universities. The expansion of flexible delivery, self-paced learning and distance-learning arrangements in all States has added further to the diversity of programmes undertaken by VET clients.

Despite the diversity within VET, the publicly funded sector has consistent fee payment arrangements in the sense that non-overseas students are charged up-front fees and charges which are not based on full cost recovery.⁸⁹

Overall, the publicly funded VET sector receives around 5 per cent of recurrent revenue from student fees and charges.

4.2.2.1 TAFE Fees

TAFE fees are the responsibility of the States. Each determines its own fee arrangements for TAFE, and cost recovery levels vary between them. None has an income-contingent loan arrangement such as HECS, although other forms of loan arrangement are available in some States.

Most States have a tuition charge (sometimes referred to as an administration charge) which is calculated on the basis of fee-per-student contact hour (ie based on number of class hours attended). New South Wales has a flat charge depending on the level and duration of the course. Some categories of course attract no fees, though an administration/general services charge may be imposed. Where fees are applied on an hourly basis, they vary between 51c per contact hour (currently under review) and \$1.75 (for short courses). Additional student services/administration charges range between \$10 and \$150. Most States cap their fees to a maximum yearly charge.

Average fees and charges per full-time equivalent student are around \$400; the average amount paid across all students, including those doing short courses, is around \$100.⁹⁰ The average amount

⁸⁶ DETYA, unpublished data. 'Fees and charges' incorporate tuition fees and other charges. The figures do not cover combined primary-secondary schools.

⁸⁷ Association of Heads of Independent Schools of Australia, *The Right School for Your Child? The AHISA Directory 1997*.

⁸⁸ NCVET, *Australian Vocational Education and Training Statistics, 1997*, p. 26. Students are considered full time if they were taking 540 or more course hours in a year. However, this measure does not account for all full-time students as it does not cover students who study full-time for only part of the year and thus do not reach a total of 540 hours.

⁸⁹ See pp. 31-35 for discussion of payment arrangements for different categories of student in higher education.

takes into account fee concessions and exemptions. Since these are common, those who pay fees would pay more than the average indicates. Materials and other costs are additional and can be substantial.

4.2.2.2 *Fee exemptions and concessions in TAFE*

A relatively high proportion of students – in many States at least 20 to 30 per cent - receive fee exemptions or concessions on the basis of need. These are provided to disadvantaged target groups such as recipients of Commonwealth benefits and pensions, eg holders of a health care card. Certain streams of study, such as Basic Employment Skills or Educational Preparation, may also be exempt from fees. All States permit discretion in the awarding of fee exemptions or concessions in recognition of an individual's circumstances. These do not apply to materials and other charges.

States also provide some support through student loans (provided by the institution or in association with student associations or financial institutions). Assistance is also available in the form of payment-by-installment arrangements for students who are not eligible for fee exemptions, but the period of time granted for payment under these arrangements is usually quite limited.

4.2.2.3 *Fees charged by commercial VET providers*

Commercial training providers set their own fees.⁹¹ Little information is available on these charges. Anecdotal evidence indicates that fees for a one-year course generally range from around \$5,000 to \$10,000, though courses with higher costs may charge more. A number of private VET providers are offering higher level courses (such as diplomas, advanced diplomas and degrees offered under arrangements with universities), partially owing to the demand for courses at these levels from overseas students.

4.2.3 *Higher education*

Unlike VET, higher education displays a variety of charging regimes within a single institution. Under HECS, students in publicly funded university places are required to make a contribution to the cost of their higher education. Fee-paying arrangements reflect a series of policy choices over the past decade, and differ at the undergraduate and postgraduate level and for overseas and non-overseas students. Discussion of the HECS charge, course fees and general or student services charges follows.

Overall, the higher education sector received around 25 per cent of its operating revenue from student fees and contributions in 1997.⁹²

4.2.3.1 *The Higher Education Contribution Scheme*

Under HECS, students in publicly funded university places are required to make a contribution towards the cost of their higher education. However, students have a choice between paying their contribution up front (and receiving a 25 per cent discount for so doing) or deferring payment. From 1998, students have been able to choose to make a partial up-front payment of \$500 or more

⁹⁰ The first figure was arrived at by dividing revenue from fees and charges for 1997 by the number of full-time equivalent students for that year, the second by dividing revenue from fees and charges by the total number of students.

⁹¹ Publicly funded private providers are usually subject to State fee policies.

⁹² DETYA, *Selected Higher Education Finance Statistics 1998*, p. 16. This figure includes HECS payments from the HECS trust fund and students' up-front payments and fees and charges from continuing education, fee-paying overseas students, fee-paying postgraduate students, and non-overseas students taking non-award courses. It excludes other fees and charges, among them fees for service.

(and receive a 25 per cent discount on the amount paid up front) and defer the remainder. Students are also able to make voluntary repayments at any time. Any voluntary repayments of \$500 or more attract a 15 per cent discount.

Under deferred payment arrangements, students enter a loan agreement with the Commonwealth Government to discharge their obligation to pay the contribution at a later date through the taxation system. This loan is interest-free. The proceeds of the loan are not paid to the student, but are paid to the institution on the student's behalf from a trust fund. Nearly 377,000 students, or 71 per cent of HECS-liable students, chose to defer payment of their HECS liability in 1996. Figures for the first half of 1998, calculated on the basis of EFTSU, show a deferral rate of 76 per cent of HECS-liable student units. 77 per cent of total EFTSU were HECS-liable.⁹³

The HECS contribution per full-time student per annum for those who commenced a course of study before 1997 is \$2,560 in 1999. From January 1997 the HECS contribution has been differentiated for all new students according to three broad discipline groups, currently \$3,409, \$4,855 and \$5,682 per student per annum. Courses have been placed in different bands depending partly on the cost of course delivery derived from the Commonwealth funding rate for each discipline group and partly on expected earnings for graduates. Assuming that a course is completed in minimum time, HECS liabilities would range from \$10,227 for a three-year arts degree to \$34,092 for a six year medical degree.

The income threshold for HECS repayments is \$21,334 for the 1998-99 income year. The thresholds are indexed each year. Once HECS repayment income has reached the threshold, the Tax Office calculates the compulsory HECS repayment for that year and includes it in the income tax notice of assessment.⁹⁴ The percentage of the HECS advance to be repaid each year rises with income until the total amount has been repaid. Individuals with a HECS debt who are entitled to a reduction or exemption from the Medicare levy for low family income are exempt from making a HECS repayment for the year in which they receive the reduction or exemption.

Table 11 below shows HECS repayment rates and income thresholds for 1998-99.

Table 11: HECS repayment rates and income thresholds for 1998-99

For HEC repayment incomes in the range:	% rate to be applied to total HEC repayment income
Below \$21,334	nil
\$21,334-\$22,498	3
\$22,499-\$24,244	3.5
\$24,245-\$28,123	4
\$28,124-\$33,942	4.5
\$33,943-\$35,726	5
\$35,727-\$38,402	5.5
\$38,403 and above	6

Source: DETYA, *HECS: Your Questions Answered, 1999*

⁹³ DEETYA, *Selected Higher Education Student Statistics, 1996*, Table 54, p. 87 and 1998, Table 78, p. 128.

⁹⁴ 'HECS repayment income' is the taxable income for any year plus any amount the taxable income has been reduced by net rental losses.

The average up front HECS payment is around \$3,150 per annum.⁹⁵

Further discussion of HECS follows in the section on subsidies to students' tuition costs (Section 5.2.3.1, The HECS subsidy).

4.2.3.2 *Open Learning Deferred Payment Scheme*

Open Learning Australia (OLA) offers courses from a number of universities by distance education mode. The method of payment is similar to HECS except that:

- OLA is able to set its own charges for units of study. For 1999, these were set at \$425 per unit.
- Students who are eligible to defer (a number of conditions apply) may defer a maximum of \$342 per unit for up to eight units (a full-time course of study), that is, a maximum of \$2,736. For 1999, this left a gap of \$83 per unit between the fee of \$425 set by OLA and amount that could be deferred. OLA students who are not eligible to defer pay the whole amount of their fee upfront. Once they have exceeded eight units per year, eligible students also have to pay the full amount up front for the extra units.

4.2.3.3 *Postgraduate course fees*

Enrolment growth in postgraduate courses has been particularly marked in coursework higher degrees. The number of students undertaking research higher degrees more than doubled between 1988 and 1998, rising from around 15,000 in 1988 to approaching 36,000 in 1998. In the case of coursework higher degrees, the number rose from nearly 15,000 in 1988 to over 52,000 in 1998.⁹⁶ The majority of postgraduate coursework places are HECS-liable at present, but changes to the number of HECS-liable places in this field mean that such courses will increasingly be offered on a fee-paying basis. For the first half of 1998, postgraduate student load (EFTSU) was around 13,000 for HECS-liable students, around 10,000 for non-overseas fee-paying students (mainly coursework for both groups) and nearly 11,000 for students on Australian Postgraduate Awards (almost entirely research).⁹⁷

Fees for postgraduate courses have been in place since the late 1980s. Universities set their own fees for these courses. Charges for Australian postgraduate students, as distinct from overseas postgraduate students, do not necessarily reflect the full cost of delivery. At present, institutions may cross-subsidise coursework degrees by charging fees to postgraduate students enrolled in a Commonwealth subsidised place, though this practice is to cease from 2000. Partly for this reason, postgraduate charges vary widely between institutions. A further difficulty in comparing postgraduate course fees is the fact that postgraduate courses with similar titles may have different delivery costs. An example of this variation is the range of costs within the field of Business, Administration and Economics shown in Table 12. It will be seen that there is a considerable disparity in levels of cost.

⁹⁵ DEETYA, *Learning for Life: a Review of Higher Education Financing and Policy: a Policy Discussion Paper*, p. 120.

⁹⁶ DEETYA, *Selected Higher Education Student Statistics, 1998*, p. 20. Figures include overseas students, of whom around 4,000 were doing research higher degrees and 12,000 coursework higher degrees.

⁹⁷ *Ibid.*, p. 128.

Table 12: Fee-paying postgraduate courses in Business, Administration and Economics, 1996

Course level	Fee per full time year of study		
	Average, weighted to take into account student load	Maximum	Minimum
	\$	\$	\$
Doctorate	17,004	19,330	4,400
Graduate diploma	7,343	15,200	3,000
Graduate certificate	7,421	15,000	2,900
Master's	9,336	40,000	3,200
All courses	8,537	40,000	2,900

Source: DEETYA, *Learning for Life: Review of Higher Education Financing and Policy: a Policy Discussion Paper*, 1997, p. 147.

4.2.3.4 Undergraduate course fees

From 1 January 1998, institutions have been able to charge fees to non-overseas students enrolling in undergraduate courses except medicine, provided that:

- institutions meet their undergraduate student load target for Commonwealth funding purposes;
- on an equivalent full-time student unit (EFTSU) basis, the number of domestic undergraduate fee-paying student places is limited to 25 per cent of the total number of domestic places in any given award course;
- higher education institutions do not substitute domestic fee-paying undergraduate places for HECS-liable places in any award course as well as in aggregate; and
- units of study offered to domestic undergraduate fee-paying students are available to undergraduate students enrolled on a HECS-liable or non-fee-paying HECS exempt basis.

Numbers enrolled under this arrangement have remained small, although there was a high percentage increase from a low base in 1999.

4.2.3.5 Fees to overseas students

Institutions are free to set their own fees for overseas students as long as they are above a minimum set by the Commonwealth. This minimum is to ensure that Australian students do not subsidise overseas fee-paying students.

4.2.3.6 Fees in the private sector

The government does not regulate fees at non-subsidised higher education institutions. The two private universities, Bond and Notre Dame operate on a non-profit basis. Private colleges may offer degrees either directly or in conjunction with other public or private institutions of higher education. Students in private institutions do not have access to HECS.

4.2.3.7 Summary of fees and charges for different categories of full-time university students

The variety of fee-paying arrangements currently in place is shown in Table 13.

Table 13: Course fees and contributory charges for full-time university students

Student category	Charges/fees \$ per year	Observations
Undergraduate non-overseas		
a) students who began their courses before 1997 incur HECS liability at a single rate	2,560	Up front payment of over \$500 on enrolment attracts a 25 per cent discount; other voluntary payments of \$500 or more attract a 15 per cent discount. Payment can be deferred.
b) from 1997: students incur differential HECS liability depending on course	3,409 4,855 5,682	As above
c) from 1998: fee-paying		Fees are estimated to range between \$10,000 and \$34,000.
d) Open Learning Deferred Payment Scheme	\$425 per unit	Eligible students can defer \$342 per unit. The remainder must be paid up-front. Non-eligible students must pay upfront.
e) private universities	6,720 (ND) 25,800 (B)	Notre Dame (ND) & Bond University (B) charge a single fee for all courses except law, which attracts higher fees. The Bond fees assume an intensive two year degree.
2. Undergraduate overseas (internal)	12,479	per capita average fees (1998 figures)
3. Postgraduate non-overseas		
a) HECS-liable		Liabilities and payment arrangements are the same as for non-overseas undergraduates
b) fee-paying	5,788	\$2,000-\$45,000 for complete course; \$5,788 is median course cost (1995 figures)
4. Postgraduate overseas (internal)	13,936	per capita average fees (1998 figures)

Sources: DETYA publications; Bond University and Notre Dame University. Fees are for 1999 except where otherwise indicated.⁹⁸

4.2.3.8 *General Services/Student Services fee*

In addition to course fees and contributory charges, universities charge general services or student services fees. With charges ranging from under \$100 to over \$400, these can add significantly to student costs. The issue of charges for student services is currently under consideration.

Table 14 indicates the range of charges in Australian universities.⁹⁹ The four publicly funded Western Australian universities charge a non-compulsory student union fee of under \$100. The

⁹⁸ Due to deficiencies in data sources, figures for overseas student fees should be treated with caution.

⁹⁹ Data was obtained on 35 of the 38 Australian universities (including both private universities). Where universities had a higher charge for beginning students than for continuing students, charges have been classified at the rate for

charges are compulsory in other States at present. Around half of universities charge commencing students between \$201 and \$300, with around 20 per cent charging between \$301 and \$400. Only two charge over this amount. Around 60 per cent of universities charge part-time students at a lower rate than full-time. Postgraduate rates are generally the same as undergraduate rates.

Table 14: Level of General Services fees and charges per annum, 1997

Fee Categories	Number of universities in each category				
	\$1-\$100	\$101-\$200	\$201-\$300	\$301-\$400	Over \$400
General Services fees	6	3	17	7	2
Lower charges for part-time students	2	3	11	6	2
Lower charges for continuing students	-	1	4	4	1
Lower charges for postgraduate degrees	-	-	1	-	-

Source: University handbooks, information from institutions.

SECTION V: PUBLIC SUBSIDIES TO STUDENTS

This section deals with the public subsidies the student may actually receive and those implicit in the price the student pays.

For the purposes of this paper, ‘the public subsidies the student may actually receive’ will be taken as referring to needs-based Commonwealth subsidies to individuals for education and training. Details of these are given below.

The paper does not cover State subsidies to help disadvantaged families with school costs such as excursions, textbooks and materials.

‘The public subsidies implicit in the prices the student pays’ refers to funding provided by governments to an institution or system to cover the gap between the student’s contribution to course costs and the cost of providing the course to the student.

Commonwealth subsidies to employers offering apprenticeships and traineeships help reduce the cost of training. However, since these subsidies are not made directly to students they are not considered here.

A substantial proportion of research postgraduate students receive Commonwealth awards which waive HECS. A smaller number also receive a living allowance.

beginning students. ‘General Services’ covers a charges referred to under different titles at different universities, eg. Student Guild/Union fees, Services and Amenities fees.

5.1 Subsidies to living costs (Youth Allowance, Austudy, ABSTUDY) and to facilitate access (Assistance for Isolated Children - AIC)

Until 1 July 1998 Commonwealth subsidies payable direct to students comprised AUSTUDY and ABSTUDY. The AUSTUDY scheme, which provided income support to full-time students aged 16 and over studying in an approved secondary or tertiary course, has been replaced by the Youth Allowance and the Austudy payment. The former is available both to full time students aged 16 to 24 years and to young unemployed people aged 16 to 20; the latter is for full-time students aged 25 and over. The ABSTUDY scheme assists eligible Aboriginal and Torres Strait Islander full-time secondary and tertiary students.¹⁰⁰ The AIC scheme provides assistance to families whose children are isolated from appropriate schooling by distance or disability.¹⁰¹ Time series data for AUSTUDY, ABSTUDY and the AIC scheme are provided in Attachment B.

Means-tested public subsidies to assist students undertaking full-time study have been a major item of Commonwealth educational expenditure. In 1996-97 the Commonwealth outlaid around \$614 million on benefits targeted directly at maintaining young people in secondary education, a sum which represents somewhat over one seventh of total Commonwealth own source outlays on education at this level. At the tertiary level the amount outlaid on personal benefits - \$1,207 million - represents a little under one fifth of Commonwealth own source outlays on VET and universities.¹⁰²

5.1.1 The Youth Allowance

The Youth Allowance, which was introduced on 1 July 1998, is intended to streamline and improve income support arrangements for young people, and remove financial disincentives to their continued participation in education and training. It is designed to account for the full range of education, training, job search and employment activities young people are likely to undertake.

Parental means testing applies for young people who are considered dependent on their parents. Dependent young people are also subject to a personal income test. Personal and spouse income and assets testing apply to independent young people. Independent young people and dependent young people who need to live away from home to study or look for work may be able to receive rent assistance.

Conditions for full-time students differ from the general conditions in that full-time students may earn a higher income before their allowance reduces. They can also convert up to \$3,500 per year of their Youth Allowance to an interest-free income-contingent loan under the Student Financial Supplement loans scheme. Each dollar of the Youth Allowance converts to a loan of two dollars under the scheme. No repayments are required for five years and then only when taxable income exceeds average earnings. No interest is charged on outstanding loans but supplement loan debts are adjusted each year for movements in the Consumer Price Index.

Maximum rates for single people with no children who are not long-term unemployed are given in Table 15. Special rates of \$214.60 (at home) and \$322.40 (away from home) apply to the long-term unemployed aged 21 and over who are entering full-time study.

¹⁰⁰ In a small number of cases, primary school students aged 14 would also receive ABSTUDY.

¹⁰¹ The information given below is intended as a broad indication of the levels of public subsidy. It is not intended to provide complete information. A number of complex conditions govern eligibility, types of benefit and rates of payment. Details may be obtained from Centrelink, which is responsible for the delivery of these allowances.

¹⁰² ABS, *Expenditure on Education, Australia, 1996-97*, No. 5510, Table 3, p. 9. ABS data differ from the DETYA figures given in Section 5.1.6.

Table 15: Fortnightly rates for the Youth Allowance, 1999

Status	Maximum fortnightly rate
	\$
Living at home aged 16-17	146.40
Living at home aged 18 or over	174.80
Living away from home	267.40

Source: Centrelink, *Youth Allowance*, 1999.

In April 1999 there were around 361,000 beneficiaries under the Youth Allowance, of whom around 77 per cent were full-time students.

The cash estimate for spending on the Youth Allowance for 1998-99 is \$1,758m (\$1,716m on an accrual basis). The forward estimate for 1999-2000 is \$1,827m (accrual estimate).

5.1.2 The Austudy payment

Full-time students aged 25 and over are eligible for means-tested Austudy payment assessed on their personal income. Conditions are similar to conditions for full time students under the Youth Allowance, including access to the supplement loans scheme. However, rent assistance is not available. The single rate of payment for 1999 is \$267.40 per fortnight, with a special rate of \$324.70 for the long-term unemployed commencing full-time study.

5.1.3 ABSTUDY

ABSTUDY assists eligible Aboriginal and Torres Strait Islander full-time secondary and tertiary students by providing income support and other supplementary assistance to address specific educational needs. Some supplementary benefits are also available to part-time, mature-aged secondary and tertiary Aboriginal and Torres Strait Islander students. Students must be studying an ABSTUDY approved course. Living allowances vary with the age of the recipient. Rates 1999 for a single student range from \$146.44 per fortnight (standard rate for dependent student aged 16-17 years) to \$391 per fortnight (independent student aged 21 years and over). The ABSTUDY living allowance is subject to parental, personal and spouse income testing. Some supplementary benefits are income-tested. Tertiary ABSTUDY recipients are also entitled to convert grant assistance to an ABSTUDY supplementary loan. New administrative arrangements for ABSTUDY are scheduled to apply from the year 2000.

5.1.4 Assistance for Isolated Children

The Assistance for Isolated Children Scheme helps the families of primary, secondary and under 16 tertiary students who do not have reasonable daily access to an appropriate government school because of geographic isolation or disability. That portion of the Boarding Allowance which is over \$3,500 is subject to parental income tests and actual board costs; other than this, the allowances are not means-tested. Table 16 shows the type of allowance and the amount payable for 1999.

Table 16: Assistance for Isolated Children Allowance: basic rates per annum

Type of Allowance	Amount per annum \$
Boarding allowance: maximum rate	4,377
Second home allowance (per student; maximum 3 students)	2,500
Distance Education Allowance: primary	1,000
secondary	1,500

Source: Centrelink, *Assistance for Isolated Children, 1999*

5.1.5 Pensioner Education Supplement

The Pensioner Education Supplement (PES) is an additional payment to recipients of income support payments from Department of Family and Community Services and the Department of Veterans' Affairs who are disabled, sole parents or carers. It is available for full-time study and in many cases for part-time study, and can be traded for a supplement loan. The basic rate for 1999 was \$60 per fortnight.

5.1.6 Beneficiaries and expenditure (1997)

Attachment B gives the number of beneficiaries and the amount expended for AUSTUDY, ABSTUDY and the AIC between 1989 and 1997. It will be seen that the total amount expended by the Commonwealth for 1997 was \$1.6 billion for around 515,000 beneficiaries. Average amounts received were around \$2,572 for AUSTUDY secondary recipients and \$3,601 for AUSTUDY tertiary recipients; \$1,983 for ABSTUDY secondary recipients and \$3,892 for ABSTUDY tertiary recipients; and \$2,185 for AIC recipients.

At the secondary school level, nearly 200,000 students received AUSTUDY in 1997, around 32,000 received ABSTUDY, and around 12,000 received Assistance for Isolated Children. The 200,000 students receiving AUSTUDY made up around 50 per cent of the total number of students aged 16 and over in secondary schools in 1997. The average amount received by a secondary student in receipt of AUSTUDY was around \$2,600.¹⁰³

At the tertiary level, around 265,000 students received AUSTUDY and 32,000 received ABSTUDY in 1997. Of the AUSTUDY students, 87,000 were in TAFE, 18,000 were in other tertiary courses, and 159,000 in higher education.¹⁰⁴ The number of TAFE students on AUSTUDY represents under 8 per cent of TAFE students taking vocational courses in 1997; the number of higher education students on AUSTUDY is about 24 per cent of the total number of higher education students. The

¹⁰³ These figures and those for tertiary students are for students receiving benefits in December 1997. They do not take account of students who dropped out during the year. As indicated on p. 34, in certain circumstances AUSTUDY could be received by students below the age of 16. AUSTUDY students would thus form a slightly lower percentage of the over 16 age group than indicated above.

¹⁰⁴ DETYA data. Other tertiary comprises mainly vocational and professional tertiary courses which do not fall within the TAFE or university sectors.

average amount received by a TAFE student in receipt of AUSTUDY was \$2,877 and the average amount received by a university student in receipt of AUSTUDY was \$4,701.¹⁰⁵

As indicated above, forward estimates of spending on the Youth Allowance for 1999-2000 are \$1,827m. A breakdown between young job seekers and student recipients of the Allowance is not yet available.

5.2 Public subsidies implicit in the price the student pays for education and training

5.2.1 Subsidies to school students

Public subsidies to government schools cover basic costs.¹⁰⁶ Whether there is any residue to be compulsorily paid by the student depends on the State. At present, only South Australia has a compulsory payment. As indicated in Section 3.1.1, in terms of recurrent funding senior secondary students received an estimated subsidy of the order of \$7,600 in 1996-97 (including superannuation but excluding costs for buildings and grounds and out-of-school costs). These estimates may be placed in context by considering the total government subsidy to a government school student. Burke's estimates indicate that government school students who complete only junior secondary school have about \$55,000 spent on their schooling. If they complete senior secondary school the total subsidy would grow to around \$71,000.¹⁰⁷

Public subsidies to non-government schools in the form of Commonwealth and State grants are based on the level of need in schools or systems. Average figures for 1997 for secondary students as a whole are given in Table 17 below. The level of grant does not vary between junior and senior secondary schooling. It should be noted that levels of subsidy vary widely around the average, particularly for independent schools.

Table 17: Per capita total income and income from recurrent Commonwealth and State grants for non-government secondary schools, 1997

School affiliation	Government grants \$	Total income \$	Grants as % of income
Catholic	4,254	6,290	68
Independent	3,106	8,396	37

Source: DETYA, unpublished data.

From 2001, non-government schools will receive a minimum subsidy from the Commonwealth of 13.7 per cent of Average Government School Recurrent Costs, equivalent to the lowest level of funding under the current system. Schools drawing enrolments from the lowest income communities will receive 70 per cent of AGSRC (as opposed to the current 56 per cent).

¹⁰⁵ DETYA figures. The higher education percentage is calculated on the basis of student numbers in the 40 institutions which receive operating funds from DETYA. DETYA does not hold student numbers for other higher education institutions. Were these included, the percentage would be slightly lower. The actual percentage of TAFE students receiving AUSTUDY is probably somewhat higher than the figure given above as some students in receipt of AUSTUDY may have been doing courses which did not take a full year to complete, ie they had left the system by December.

¹⁰⁶ These include staff salaries and allowances, provision of building and grounds, other operating expenditure, and superannuation.

¹⁰⁷ See Burke, *Expenditure on Education and Training: estimates by sector and course*, p. 10. This estimate is for 1995-96 and includes superannuation, buildings and grounds, and out-of-school costs.

As indicated in the section on student costs, fees and charges met around one quarter of costs per student in Catholic secondary schools and around half of costs in independent secondary schools in 1996. Private donations and income form an additional source of income to grants and fees.

5.2.2 Subsidies to VET students¹⁰⁸

For 1997, subsidies for VET students in public sector institutions covered around 95 per cent of course costs on average, based on average fees and charges as a percentage of the unit cost. On the basis of unit costs for a full-time study load of around \$8,200 a year, including average fees per equivalent full-time student of \$400, the public subsidy would be around \$7,800. However, fewer than 10 per cent of VET students take over 540 course hours per year. Nearly two-thirds take less than 200 hours.¹⁰⁹ The average student who takes 198 hours at an estimated total cost of under \$2,300 and pays around \$100 in fees would receive a subsidy of under \$2,200. The average amount of fees quoted includes fee concessions and exemptions. Since these are common, those who do pay fees would pay a higher percentage of costs than the average indicates. The figures given are national averages; the level of cost recovery varies considerably between States.

The majority of private VET provision receives no government subsidy.

5.2.3 Subsidies to university students

5.2.3.1 The HECS subsidy

Students attending publicly funded universities are subsidised in two main ways. Firstly, they pay less than the full costs of their tuition. This recognises that in addition to private benefits in the form of higher incomes and lower rates of unemployment, there are significant spillover benefits to society from their education. Secondly, there is the subsidy contained in payment arrangements for HECS. As indicated earlier, the HECS charge may be paid up front in whole or in part with a discount or deferred (see discussion under 4.2.3.1: the Higher Education Contribution Scheme).

The average cost of an undergraduate place in 1997 has been estimated at around \$9,300. The average up front HECS payment is around \$3,150. The net public subsidy to the student who makes an up front payment is therefore of the order of \$6,150 per undergraduate EFTSU, or around 66 per cent of costs.¹¹⁰

Table 18 shows:

- the HECS band for each discipline;
- estimated full course costs based on the estimated Commonwealth funding rate; and
- the proportion of full course costs contributed by students in different disciplines.

The figures are for the total HECS contribution, that is, they do not take into account the 25 per cent saving on up-front payment. The cost of course provision is based on an estimate of the

¹⁰⁸ Figures refer to students in the publicly funded VET system.

¹⁰⁹ NCVER, *Australian Vocational Education and Training Statistics, 1997*, p. 26.

¹¹⁰ DEETYA, *Learning for Life: a Review of Higher Education Financing and Policy: a Policy Discussion Paper*, p. 120.

Commonwealth funding rate for each discipline group for 1997. Universities may allocate more or less than this amount; DETYA does not have data on the actual costs of provision of various units.

Table 18: Proportion of full cost contributed by undergraduate students in various discipline groups, 1997

	HECS contribution	Full cost	Proportion of full cost contributed
	\$	\$	%
Band 1			
Arts, Humanities	3,300	6,250	53
Legal studies	3,300	6,250	53
Social studies, behavioural science	3,300	8,125	41
Education	3,300	8,125	41
Visual/performing arts	3,300	10,000	33
Nursing	3,300	10,000	33
Band 2			
Administration, business, economics	4,700	6,250	75
Mathematics	4,700	8,125	58
Computing	4,700	10,000	47
Other health	4,700	10,000	47
Built environment	4,700	10,000	47
Science	4,700	13,750	34
Engineering	4,700	13,750	34
Agriculture, animal husbandry	4,700	16,875	28
Band 3			
Law	5,500	6,250	88
Medicine	5,500	16,875	33
Dentistry	5,500	16,875	33
Veterinary science	5,500	16,875	33

Source: Higher Education Division, DETYA.

The nominal subsidy is the difference between the full course cost based on the estimated Commonwealth funding rate for each discipline group and the amount paid by the student under HECS. The lowest proportion of course costs (28 per cent) is payable by students of agriculture and animal husbandry. In dollar terms, this amounts to a subsidy of around \$12,175 for each year of their course. The highest proportion of costs is payable by students of administration, business and economics (75 per cent) and law (88 per cent). Students in first group get a subsidy of \$1,550 per annum and in the second a subsidy of \$750 per annum. Students in most discipline groups contribute between 33 and 55 per cent of the full cost of a place. Only four discipline groups are outside this range.

To calculate the effective rate of subsidy (as far as this can be done without having data on the cost of individual courses at particular universities) one needs to factor in the subsidy provided to students by the 25 per cent discount for upfront payment and the implicit interest rate subsidy gained by a student who defers payment. These are not taken into account in Table 18. The 75 per cent upfront payment can be regarded as forming the student contribution, with the 25 per cent

discount viewed as a service fee in lieu of interest, risk spreading and administration costs.¹¹¹ If the payment is regarded in this light, the proportion of the cost met by the most highly subsidised group, agriculture and animal husbandry, would fall to 21 per cent and that paid by the least subsidised group, law, would fall to 66 per cent, that is, the subsidy to the former group would be \$13,350 per annum and to the latter \$2,125 per annum.

Alternatively, the net present value of deferred HECS payment under differential HECS can be calculated. Recent research has modelled the net present value of student payments for the three categories of HECS for a three-year degree. The results are presented in Table 19.¹¹² The lower value for females arises because the lower incomes of females imply a slower rate of repayment compared to males, and so the present value is reduced.

Table 19. Net present values of HECS payments for students in different HECS categories for a three year degree

HECS fee charged	Net present values	
	Males	Females
\$	\$	\$
9,900	8,700	8,500
14,100	11,900	11,500
16,500	13,700	13,100

Source: Miller and Pincus, 'Financing Higher Education in Australia', p. 47.

If these figures are related to Table 18, the effective rate of subsidy for a male student would be \$38,725 for a three year agriculture course and \$6,850 for a three year business/economics course.

Repayment periods for graduates with typical earnings patterns under differential HECS are expected to range from 6 to 9 years.¹¹³ It is estimated that about 13.6 per cent of the HECS debt outstanding in 1997 will not be recovered.¹¹⁴

Under current taxation arrangements, HECS repayments are not tax-deductible. It has been argued that this prejudices investment in human capital as opposed to investment in physical capital. With regard to HECS, lack of deductibility can be seen as lowering the public subsidy afforded those who pay HECS. In some cases students would be better off if they were charged the full cost of their courses but allowed to claim costs as a tax deduction. For example, a student who graduates with a three-year degree in economics and a HECS liability of \$14,100 would be on average as well off with a HECS debt of the full cost of \$19,500 deductible from income on a depreciation schedule at a tax rate of 28 per cent. Where marginal tax rates are in excess of 28 per cent the student is better off with the full cost of the course as a tax deduction than with the current HECS repayment arrangement.¹¹⁵ This particular example, however, is for one of the least subsidised courses under the current regime; for more highly subsidised courses the student would in many cases be better off

¹¹¹ See Paul W. Miller and Jonathan J. Pincus in 'Financing Higher Education in Australia: the Case for SuperHECS', June 1997.

¹¹² Ibid, 33-34, 46-47. The simulations are based on the income profiles of employed graduates derived from the 1991 Census of Population and Housing. Age-income profiles were constructed from this source. The profiles for 1991 were adjusted for secular real income growth by applying a two percent compound growth factor. The 1997 repayment rates are used. A discount rate of five per cent is used throughout.

¹¹³ Senator Vanstone, *Employment, Education, Training and Youth Affairs Budget Statement, 1996*.

¹¹⁴ DEETYA, *Higher Education Funding Report for the 1998-2000 Triennium*, AGPS, 1997.

¹¹⁵ Miller and Pincus, p. 16.

at present. The value of making tuition fees a tax deduction has been contested on the grounds that the respective benefits and distortions of deductibility and non-deductibility are small.¹¹⁶

5.2.3.2 *Subsidies to postgraduate students*

At the postgraduate level, institutions receive funding for an agreed number of publicly funded places for postgraduate research degrees. The current formula for allocating postgraduate awards provides older and larger universities with more HECS exemption postgraduate award scholarships than they can use, while newer universities have a shortfall. Fees are increasingly being charged for coursework degrees. A little over a quarter of coursework postgraduate programmes in the humanities and social sciences charged fees in 1997, but this figure is expected to rise considerably.

As universities are not currently obliged to fill publicly funded places for research or coursework higher degrees, they may thus use these to cross-subsidise fee paying places. Considerably less work has been done on subsidies to postgraduate students than to undergraduate students; however, the West Review estimates that public funding for the tuition costs of a full-time HECS-exempt PhD student over three and a half years averages around \$70,000.¹¹⁷ The level of funding for course-work degrees depend on whether the course is HECS liable or, if fee-paying, what fee is charged and the level of cross-subsidy. Fees vary between institutions and courses. The level of subsidy is thus a variable one. From 2000, arrangements will change in that universities will no longer be able to charge fees to postgraduate students enrolled in a Commonwealth subsidised place.

Under the Relative Funding Model, postgraduate awards are not differentiated by level of course. The only distinction additional to the field of study is whether they are coursework or research degrees; the former have a discipline weighting in three clusters ranging from 1.4 to 3.0 while the latter are weighted at two clusters of 2.0 and 4.0 (see Attachment A on the Relative Funding Model).

SECTION VI: CONCLUSION

This conclusion summarises points made in the preceding sections and highlights some issues currently being debated.

6.1 Government funding arrangements

The proportion of government funds provided to the three sectors varies substantially, as does the role played by the Commonwealth in that allocation.

In summary, Governments meet all basic costs of the government school system and provide over half the revenue of private or non-government schools. The Commonwealth provides around 12 per cent of government school revenue and around 69 per cent of non-government school revenue from government sources.

In the public VET sector, Commonwealth funding accounts for around 35 per cent of total public funding. Funding is allocated to the States through ANTA on the basis of Annual VET Plans for each State, developed in consultation with industry.

¹¹⁶ See Bentick, p. 9.

¹¹⁷ DEETYA, *Learning for Life*, p. 138.

At the level of higher education the Commonwealth Government provides over half of total funds. State level funding is minimal. Commonwealth funds are provided to institutions in accordance with an agreed educational profile negotiated between the institution and the Commonwealth. Funding is restricted to a legislatively designated list of providers, with those outside the list receiving no operating funds from the Government.

In some respects funding practices in the tertiary education sector are diverging. While public institutions in VET have traditionally been the main recipient of government VET funds, the introduction of a competitive training market means that an increased proportion of government VET funding is now going to community and private providers, as well as schools. Although the number of publicly funded students outside TAFE and the community education sector is still small in absolute terms, growth has been rapid and is expected to continue.

6.2 Relative unit costs

Figures for relative costs can provide only the broadest approximations of costs for each sector, as cost estimates per student are highly sensitive to differences in assumptions, definitions, source data and methodology. There is considerable scope for further research into the differences in data collection between sectors. In these circumstances, care should be exercised in drawing conclusions relating to comparisons between the sectors. It should be borne in mind that different cost structures are to be expected in sectors with different missions, student populations, and geographic dispersal, with associated differences in terms of class sizes and class contact hours.¹¹⁸

While estimates are not readily comparable across sectors, those presented in this paper indicate more overall similarity in the rough order of magnitude of recurrent costs for the different sectors of post-compulsory education and training than might have been expected. The lowest unit costs appear to be those of senior secondary students in Catholic schools at around \$6,600 per year, followed by those of senior secondary students in government schools. The next highest are costs for publicly funded VET students, followed by those for students in independent non-government schools. Costs are highest for university students, at around \$9,300 per year. No data are available on unit costs in the private VET sector.

In the case of publicly funded VET, it should be borne in mind that most students are taking short courses. If the hourly unit cost of VET is multiplied by the average hours of study per student (198 hours in 1997), this would result in an estimated cost per student of under \$2,300.

In VET the highest cost course is roughly twice as dear as the lowest. In higher education, the highest cost courses are roughly three times as dear as the lowest. When the shorter length of most VET courses is taken into account, the majority of the dearer VET courses would in most cases cost only as much as the least expensive higher education courses.

The study by Shah referred to in Section 3.1.1 (Government schools) indicates that with regard to teacher-related costs, the highest cost subjects in Victorian senior secondary schools are more than twice as expensive as the lowest.¹¹⁹

¹¹⁸ A similar point is made by Gerald Burke in *Expenditure on education and training: estimates by sector and course*.

¹¹⁹ See C. Shah, "Recurrent teacher cost per student in key learning areas".

6.3 Fees and charges payable by students

As indicated above, there are substantial differences in the degree to which individuals contribute to the cost of their education, with considerable variations within and between sectors.

On average the highest fees and charges are paid by university students and by school students in independent schools. Fees in private VET institutions also tend to be relatively high. Students in Catholic systemic schools pay less on average, followed by VET students in publicly funded institutions. Fees and charges in most government school systems are voluntary, though there may be pressure on parents to pay.

The burden of tuition charges on university students is eased by the fact that almost all non-overseas university undergraduates are in HECS liable places, which give them access to interest-free income-contingent loans. The value of these loans is clearly predicated on the expectation of a higher stream of income following university graduation; that is, students must find the private rate of return worthwhile to undertake study on this basis. Private rates of return have been shown to be high for a university education. Studies on the private rate of return in the VET sector have produced conflicting results.

TAFE fees and exemption policies tend to be consistent within States. The higher education sector may exhibit a wide variety of fees and charges within a single institution (eg HECS; undergraduate full-fee; postgraduate fee-paying) reflecting successive changes to policy over the years.

6.4 Public subsidies

6.4.1 Subsidies to living costs

Needs-based subsidies to the living costs of students have been a major item of Commonwealth expenditure. Figures for December 1997 show over 50 per cent of school students over 16 and around 24 per cent of university students received AUSTUDY. A lower percentage of TAFE students received AUSTUDY. Patterns of uptake for the Youth Allowance and Austudy, which replaced AUSTUDY, have not yet emerged clearly.

6.4.2 Subsidies implicit in the price the student pays for education and training

Public subsidies to government schools cover basic costs. A senior secondary student whose schooling has unit costs broadly estimated as being in the vicinity of \$7,600 may contribute an additional 5 to 10 per cent for ancillary costs.

Students in non-government schooling pay a proportion of their costs, with Government subsidies to recurrent funding being allocated to schools or systems on the basis of need. From 2001 the minimum level of Commonwealth subsidy to non-government schools will be 13.7 per cent and the maximum will be 70 per cent of Average Government School Recurrent Costs. Subsidies from State Governments are additional to Commonwealth funding.

If the level of government subsidy is matched against the estimated recurrent costs for senior secondary students for 1997, Catholic schools receive a subsidy of around 65 per cent of costs for senior secondary students and independent schools a subsidy of around 35 per cent.

VET students in publicly funded institutions receive an average government subsidy of around 95 per cent of costs. In higher education, the subsidy is lower and there is greater variation in the level of subsidy between courses. Undergraduates who pay HECS upfront receive an average subsidy of around 66 per cent.

While the percentage of the cost met through subsidy is higher in VET than in universities, in terms of absolute amounts the average VET student receives a considerably lower subsidy than the average higher education student due to the shorter duration of most VET courses. The difference in levels of subsidy between the universities and VET has not prevented an increase in the flows of students from VET to universities and from universities to VET.

6.5 Convergence and divergence

As indicated earlier in this paper, boundaries between the three sectors are becoming increasingly permeable. The closest links appear to be between VET and the schools sector, but student movement between sectors, commonality of courses, and credit transfer are increasing in tertiary education. At present absolute numbers involved in cross-over at the tertiary level are small, but can be expected to increase as Australia moves towards a seamless system of tertiary education. As this happens, the costs borne by students and the amount and method of allocation of government funds are likely to become increasingly important.

Despite convergence at the margins, the fundamental missions of the sectors remain different. The VET sector, for example, is distinguished by the key role of industry, which is actively involved in policy development as well as in the development of competency standards and quality assurance arrangements. In recent years the VET system has developed a regulatory framework at a national level not shared by higher education. Similarly, VET moves towards a competitive market for education and training have not been replicated in higher education.

The diversity of funding mechanisms, student contributions, and level of public subsidy which characterises the different sectors of post-compulsory education and training in part reflects the distinctive mission, student population, and teaching arrangements of each sector. To this extent, divergence is likely to continue. At the same time, each sector is subject to a range of common pressures in the form of demands for accountability, budgetary constraints, and changing levels of student demand. Which policy options are adopted to deal with these pressures and opportunities is ultimately a political decision, dependent on a variety of factors outside the purview of this paper.

Attachment A

Relative Teaching Costs Matrix

Base: Cluster 1 Undergraduate = 1.0

Cluster	Discipline Weights		
	Undergraduate	Other Postgraduate	Research Degree
1	1.0	1.4	2.0
2	1.3		
3	1.6	1.8	
4	2.2	3.0	4.7
5	2.7		

Relative Teaching Costs Matrix: Clustering of Disciplines

Cluster	Undergraduate	Other Postgraduate	Research Degree
1	Accounting Admin/Economics Law Other Humanities	Admin/Economics Education Law Maths/Stats Other Humanities	Accounting Admin/Economics Computing Education Law
2	Behavioural Science Education Maths/Stats Other Social Studies	Other Postgraduate Other Social Studies	Maths/Stats Nursing Other Built Env. Other Health Other Humanities
3	Computing Nursing Other Built Env. Other Health Other Languages Visual/Perf. Arts	Computing Nursing Other Built Env. Other Health Other Languages Visual/Perf. Arts	Other Languages Other Social Studies Visual/Perf. Arts
4	Engineering Science Surveying	Agriculture Behavioural Sci. Dentistry Engineering	Agriculture Behavioural Sci. Dentistry Engineering
5	Agriculture Dentistry Medicine Vet. Science	Medicine Science Surveying Vet. Science	Medicine Science Surveying Vet. Science

Note: The discipline groups above are based on the discipline classification used in the collection of statistics by DETYA.

Beneficiaries of and Expenditure on AUSTUDY/ABSTUDY/AIC, 1989-97

AUSTUDY

Year	Secondary		Tertiary		Total	
	Beneficiaries	Expenditure	Beneficiaries	Expenditure	Beneficiaries	Expenditure
1989	157,548	312,010,670	141,890	452,386,193	299,438	764,396,863
1990	186,338	383,189,880	152,779	513,314,911	339,117	896,504,791
1991	221,452	498,960,488	183,314	671,858,305	404,766	1,170,818,793
1992	241,687	594,321,529	216,891	838,563,057	458,578	1,432,884,586
1993	236,938	593,153,947	232,221	890,017,993	469,159	1,483,171,940
1994	225,686	565,588,834	252,571	898,169,889	478,257	1,463,758,723
1995	211,359	529,672,569	273,667	980,684,141	485,026	1,532,510,834
1996	208,047	537,829,279	281,494	994,681,555	489,541	1,510,356,710
1997	199,874	514,130,939	264,374	952,002,933	464,248	1,466,133,872

ABSTUDY

Year	Secondary		Tertiary		Total	
	Beneficiaries	Expenditure	Beneficiaries	Expenditure	Beneficiaries	Expenditure
1989	24,708	38,856,381	15,650	35,400,944	40,358	74,257,325
1990	31,180	41,297,778	13,484	46,281,098	44,664	87,578,876
1991	25,648	41,600,498	14,633	53,793,168	40,281	95,393,666
1992	25,458	41,949,007	16,808	65,647,125	42,266	107,596,132
1993	25,543	43,376,892	16,766	67,304,866	42,309	110,681,758
1994	26,283	44,801,213	17,988	69,180,944	44,271	113,982,160
1995	26,869	47,281,098	18,966	71,270,700	45,835	118,551,798
1996	27,530	46,539,231	21,239	75,092,235	48,769	121,631,466
1997	31,725	62,918,946	19,038	74,089,059	50,763	137,008,005

AIC

Year	Secondary	
	Beneficiaries	Expenditure
1989	14,662	14,805,070
1990	12,984	13,269,415
1991	12,993	17,389,062
1992	13,117	24,295,222
1993	12,916	24,075,820
1994	13,035	24,320,722
1995	12,064	23,034,809
1996	11,896	23,420,792
1997	12,243	26,746,064

TOTAL

Year	Secondary		Tertiary		Total	
	Beneficiaries	Expenditure	Beneficiaries	Expenditure	Beneficiaries	Expenditure
1989	196,918	365,672,121	157,540	487,787,137	354,458	853,459,258
1990	230,502	437,757,073	166,263	559,596,009	396,765	997,353,082
1991	260,093	557,950,048	197,947	725,651,473	458,040	1,283,601,521
1992	280,262	660,565,758	233,699	904,210,182	513,961	1,564,775,940
1993	275,397	660,606,659	248,987	957,322,859	524,384	1,617,929,518
1994	265,004	634,710,769	270,559	967,350,833	535,563	1,602,061,605
1995	250,292	599,988,476	292,633	1,051,954,841	542,925	1,674,097,441
1996	247,473	607,789,302	302,733	1,069,773,790	550,206	1,655,408,968
1997	243,842	603,795,949	283,412	1,026,091,992	527,254	1,629,887,941

BIBLIOGRAPHY

- Ainley, John and Fleming, Marianne, Australian Council for Educational Research, *1996 School - Industry Programs: National Survey Summary Report*, for the Australian Student Traineeship Foundation, 1997.
- Association of Heads of Independent Schools of Australia (AHISA), *The Right School for your Child? The AHISA Directory 1997*, New Hobsons Press, 1997.
- Australian Bureau of Statistics (ABS), *Commercial Training Providers, Australia, 1994*, Catalogue No. 6352.0, 1996.
- ABS, *Education and Training Experience Australia 1997*, Catalogue No. 6278.0.
- ABS, *Expenditure on Education, Australia, 1995-96, 1997 and 1996-97, 1998*, Catalogue No. 5510.0.
- ABS, *Schools, Australia, 1988-98*, Catalogue No. 4221.0.
- Australian Council for Private Education and Training, *Submission to the Review of Higher Education Financing and Policy*, 1997.
- Australian Education Council Review Committee, *Young People's Participation in Post-compulsory Education and Training* (the Finn Report), 1991.
- Australian National Training Authority (ANTA), *Annual National Report 1995, 1996, 1997*.
- ANTA, *Australia's National Strategy for Vocational Education and Training 1998-2003*.
- ANTA, *Response to the Review of Higher Education Financing and Policy*, 1997.
- ANTA, *Submission to the Review of Higher Education Financing and Policy*, 1997.
- ANTA, *Vocational Education and Training: Directions and Resource Allocations for 1997: Report to the Ministerial Council*, 1996.
- ANTA, *Vocational Education and Training: Directions and Resource Allocations for 1998: Report to the Ministerial Council*, 1997.
- Australian Vice-Chancellors' Committee, *Submission to the Review of Higher Education Financing and Policy*, 1997.
- Bentick, Brian, 'Rethinking HECS: its Definition and Fiscal Role', 26th Annual Conference of Economists, Hobart, 1997.
- Burke, Gerald, *Expenditure on education and training: estimates by sector and course*, Monash University-ACER Centre for the Economics of Education and Training, Working Paper No. 19, July 1998.
- Centrelink, *Youth Allowance; Austudy payment; ABSTUDY; Assistance for Isolated Children; Pensioner Education Supplement*, 1999
- Department of Employment, Education, Training and Youth Affairs (DEETYA; from October 1998: Department of Education, Training and Youth Affairs – DETYA), *Annual Reports, 1990-91 to 1997-98*.
- DEETYA, *Learning for Life: review of higher education financing and policy: a policy discussion paper*, 1997.
- DEETYA, *Learning for Life: review of higher education financing and policy: final report*, 1998.
- DEETYA, *Programmes, 1990-91 to 1998-99*.
- DEETYA, *Schools Funding: Consultation Report*, October 1997.
- DEETYA, *Selected Higher Education Finance Statistics 1997 and 1998*.
- DEETYA/DETYA, *Selected Higher Education [Student] Statistics, 1989-1998*.
- DETYA, *Higher Education Report for the 1999 to 2001 Triennium*, 1999.
- Industry Commission, *Industry Commission Submission to the Review of Higher Education Financing and Policy*, Industry Commission, Canberra, July 1997.
- Long, Michael, Phillip McKenzie, Andrew Sturman, *Labour Market and Income Consequences of Participation in TAFE*, ACER Research Monograph No. 49, 1996.
- Ministerial Council on Education, Employment, Training and Youth Affairs (MCEETYA; formerly Australian Education Council), *National Report on Schooling in Australia, 1989-1997*.

MCEETYA, *National Schools Statistics Collection*, 1989-97.

Miller, Paul W. and Pincus, Jonathan J., 'Financing Higher Education in Australia: the Case for SuperHECS', 1997.

National Centre for Vocational Education Research (NCVER), *Selected Vocational Education and Training Statistics*, 1993 - 97 (from 1996 entitled *Australian Vocational Education and Training Statistics*) for the Australian Committee on Vocational Education and Training Statistics (from 1996: for the Australian National Training Authority).

Senate Employment, Education and Training Reference Committee, *Not a Level Playground: the Private and Commercial Funding of Government Schools*, 1997.

Shah, Chandra, 'Recurrent teacher cost per student by key learning area: upper secondary schools, Victoria, Australia', *Education Economics*, Vol 6, No. 2, 1998, pp. 121-139.