



CEDA

COMMITTEE FOR ECONOMIC DEVELOPMENT OF AUSTRALIA

**TRAINING FOR A SKILLED
WORKFORCE :
REVIEW OF THE NATIONAL
TRAINING REFORM AGENDA**



**STRATEGIC ISSUES FORUM
MAY 1995**

INTRODUCTION

In recent years there has been increasing recognition of the importance of a highly skilled and adaptable workforce in establishing and maintaining Australia's competitive advantage in the global economy. As well, changes to the nature of work resulting from new organisational structures and technological innovation require workers to possess higher skill levels than ever before. In response to these factors the Commonwealth, State and Territory Governments have implemented a number of reforms known as the National Training Reform Agenda (NTRA) which aim to improve Australia's vocational education and training (VET) system in order to better provide the workforce with the skills required for the contemporary economy.

This report aims to assess the NTRA initiatives and offer recommendations for further improvement to Australia's VET system. Section 1 provides a brief overview of Australia's VET system; Section 2 outlines the key components of the training reform agenda; Section 3 asks whether the reforms are working; and recommendations for further improvement are contained in Section 4.

The report is the outcome of CEDA's Strategic Issues Forum project titled "The Changing Nature of Work: Implications for Vocational Education and Training". The project comprised a series of seminars which examined the relationship between industry and the education system. Appendix 1 provides an outline of the seminar series. The papers delivered at the seminars provided major input into this report.

The NTRA has been the subject of considerable public debate and analysis. This report also draws on a number of recent reports on the subject - in particular a study by the Allen Consulting Group commissioned by the Australian National Training Authority entitled *Successful Reform: Competitive Skills for Australians and Australian Enterprises* (1994). Several government reports - including *Working Nation: The White Paper on Employment and Growth* - have also been used as reference documents.

Issues concerning vocational education and training are complex and are often interwoven with other policy areas, such as labour market deregulation and general education. This report does not attempt to find definitive solutions - rather the aim is to highlight areas of continuing concern and to make recommendations for improvement.

Chapter 1 VOCATIONAL EDUCATION AND TRAINING IN AUSTRALIA

Vocational education and training in Australia is provided by TAFE (Technical and Further Education) colleges, employers conducting on-the-job and in-house training, commercial providers, community based providers and by cooperative training ventures within particular industries. Most formal VET occurs within the publicly funded TAFE system which has approximately 1.6 million students. Total expenditure is currently running at \$2.9 billion per year (including capital expenditure). Industry spends at least that amount again on its own training. TAFE courses cover entry level training, as well as re-skilling and upskilling for people already in the workforce. (Moran, 1993b and Committee on Employment Opportunities).

Training occurs on three levels: formal training, comprising structured programs, the successful completion of which enables participation in the next higher level of the national education system; non-formal training comprising structured programs that may not be recognised for entry into the next higher level of the education system; and informal training comprising unstructured programs conducted on-the-job (Hall 1993b).

The provision of VET varies between occupations based on differences in skill needs - for example, 28 per cent of training is in the trades and skilled occupations which make up 13 per cent of the workforce and only 7 per cent is in operative occupations such as clerks, salespersons, plant operators, drivers and labourers, which make up some 48 per cent of the total workforce. (Moran, 1993b)

Whilst school retention rates and university enrolments have risen dramatically in the last decade, the number of young people undertaking vocational training has barely changed. Over the last 10 years the proportion of 15 to 19 year olds in higher education has jumped by two thirds - yet the number undergoing vocational training has risen less than one per cent to 13.9 per cent. As a proportion of the labour force, the number of apprentices and trainees is now at its lowest point in a quarter of a century. We have one of the lowest rates of participation in secondary level vocational education in the OECD. While international comparisons of VET systems are difficult due to different educational systems and classifications, evidence suggests that in the mid-1980s only 20 per cent of young Australians were getting a vocational (ie. non-university) education compared with an OECD average of 50 per cent and 80 per cent in West Germany. (Sweet, 1994; Roberts, 1994; Working Nation, 1994 and Committee on Employment Opportunities, 1993)

Problems with the Traditional System

Increasing recognition of the importance of training highlighted problems within the traditional VET system and led to the implementation of the NTRA. These problems included:

- lack of industry involvement and direct relevance to industry needs;
- limitations of the apprenticeship and traineeship systems¹ including:
 - that they were available for a narrow range of industries and occupations;
 - only young people were eligible;
 - very few women participated;
 - the focus was on time serving rather than the acquisition of specific skills;
 - the number of positions depended on an employer's ability to recruit trainees and thus fluctuated with the economic cycle; and
 - inflexible practices associated with employing trainees.
- lack of flexibility in the delivery of training by TAFE and a lack of responsiveness to individual enterprise needs - for example, training was often delivered at times, in locations and using methods of delivery which did not correspond with client needs;
- lack of any structured training for many occupations, especially in rapidly evolving industries such as tourism, hospitality, retail, and financial services;
- a lack of national coordination of training provision and qualifications and inconsistencies between the eight different state and territory vocational education systems;
- emphasis on training at the trades level and above with a lack of training opportunities for traditional unskilled workers;
- provision of training opportunities for only a minority of young people with low female participation;
- a rigid separation of general and vocational education; and
- inadequate recognition of the need for higher rates of learning throughout employment - education and training were not regarded as life long activities.

Award Restructuring

The importance of a highly skilled workforce was strongly emphasised in the 1986 report of the ACTU/TDC Mission to Western Europe, *Australia Reconstructed*; and the importance of training was formally recognised in the industrial relations system with the introduction of award restructuring - facilitated by the Australian Industrial Relations Commission's

¹ The Australian Traineeship System (ATS) was introduced in 1985 to provide young people aged 15 to 19 with similar types of training and work experience opportunities to those provided through apprenticeships, in a range of non-trade occupations such as retail, banking and clerical. Traineeships are generally for a 12 month period with a minimum of 13 weeks structured off-the-job training in TAFE or other approved training centres. Career Start Traineeships build on and enhance the existing ATS. They provide a bridge between existing arrangements and the AVTS. In many instances CSTs form an integral part of the piloting of AVTS. (Committee on Employment Opportunities, 1993)

decision on the Structural Efficiency Principle in the 1988 National Wage Case. Key features of award restructuring have been the insertion of new skill-based career paths in awards, new training arrangements, fewer worker classifications, multiskilling, new forms of work organisation and reduced demarcations (Sloan, 1994).

These changes facilitated considerable innovation in training practices in many Australian enterprises (CEDA, 1994).

Chapter 2

THE NATIONAL TRAINING REFORM AGENDA

In order to improve the quality, flexibility and responsiveness of vocational education and training, the Commonwealth, State and Territory Governments have agreed on a program of reforms commonly known as the National Training Reform Agenda. The NTRA is a loose collection of policy initiatives which aim to:

- make training more relevant to the specific needs of industry;
- enable national recognition and portability of individual skills and qualifications;
- encourage greater competition between TAFE and commercial training providers; and
- improve the quality of training and provide greater access to the vocational education and training system by all people, including the disadvantaged.

A number of government reports have informed the process of training reform in Australia, the most significant being the Finn², Mayer³ and Carmichael⁴ reports.

Recommendations in these reports reflect recent trends in VET in other countries - particularly the US and the UK.

The Finn Report

The Finn Report (1991) argued for an increase in post compulsory education and training in Australia in order to equip the workforce with the skills required for the new patterns of work organisation. The Report proposed that all young people should complete Year 12 (or an equivalent qualification) and at least half should go on to higher education. It was argued that the current schools system was primarily aimed at preparing and selecting students for university - yet a large proportion of students staying on at school will not enter university and are not provided with the skills required for successful participation in the workforce. The report recommended changes to Australia's post-compulsory school arrangements so as to better prepare students for the world of work.

The key recommendations were:

2 Australian Education Council Review Committee. 1991. *Young People's Participation in Post-Compulsory Education and Training*. AGPS, Canberra.

3 The Mayer Committee. 1992. *Employment Related Key Competencies : A Proposal for Consultation*. Melbourne. A condensed version, *Putting General Education to Work : The Key Competencies Report* was also released.

4 Employment and Skills Formation Council. 1992. *The Australian Vocational Certificate Training System*. AGPS.

- the introduction of targets for a significant increase in the number of young people completing secondary education and participating in higher education;⁵
- the development of a new entry level training system to extend beyond the existing apprenticeship and traineeship occupations;
- the development of a standards framework of employment-related key competencies⁶ and incorporation of key competencies in all education and training programs for young people; and
- greater integration of vocational and general education and strengthening of pathways and articulation arrangements between schools and TAFE.

In October 1991 State and Commonwealth Ministers of Education agreed in principle that by the year 2001, 95 per cent of 19 year olds should have completed Year 12 or an initial post-school qualification or be participating in education or training.

The Mayer Report : Key Competencies⁷

The Mayer Committee was established to develop the concept of employment-related key competencies recommended in the Finn Report. The Mayer Report (1992) proposed a set of seven key competencies considered essential for young people to participate effectively in the new patterns of work and work organisation, together with principles to provide for nationally consistent assessment and reporting of young people's achievements in the key competencies (Borthwick, 1992).

Key competencies are not concerned with knowledge *per se* but with the application of knowledge and what people can do in the workplace. The emphasis is on the ability to do something rather than just *know* something.

Employment-related Key Competencies are competencies which are essential for effective participation in work. They focus on the capacity to apply knowledge and skills in an integrated way in work situations. The Key Competencies are generic in that they apply to work generally rather than being specific to work in particular occupations or industries. This characteristic means that the competencies are not only essential for effective participation in work but are essential for effective participation in other social settings. The Key Competencies also have use and value for young people entering further vocational education and training and higher education.

5 Targets proposed were:

- as a minimum, at least a Level 1 traineeship or participation in Year 12 for all 18 year olds by 1995;
- at least a Level 2 traineeship or progress toward a higher level vocational or academic qualification for almost all 20 year olds by 2001; and
- at least a vocational certificate (Level 3) or progress toward a vocational qualification above Level 3 or diploma or degree for at least 50 per cent of 22 year olds by 2001.

6 Employment-related key competencies are defined as those essential things which all young people need to learn in preparation for employment. These key competencies are in the areas of : language and communication; mathematics; scientific and technological understanding; cultural understanding; problem solving; and personal and inter-personal characteristics.

7 Whilst key competencies are concerned primarily with the school rather than the training sector, they are closely linked to CBT and are thus included in this report.

Development of the key competencies is essential for all young people. The key competencies have immediate relevance for young people intending to enter employment direct from school or entry-level vocational education and training programs. For young people intending to undertake further vocational education and training or higher education prior to entering employment, the Key Competencies will lay a foundation for effective participation in work in the longer term and have immediate use and value by developing their capacity to take increasing responsibility for their learning. (Mayer Report, 1992, p. 5)

The key competency framework acts as a guide for the development of curriculum and teaching methods in schools and training institutions. It is proposed that key competencies will foster closer linkages between education, training and work and provide a means of better preparing young people for employment. Through involvement in the development of key competencies, industry can articulate its requirements of the education system.

The Commonwealth has allocated \$20 million dollars for the development of key competency pilots for the three years 1993-1996. Whilst the main focus is on schools, pilots have also been developed in the VET sector and in industry. The main thrust of the pilots is on four areas: determining to what extent key competencies are already implanted in curriculum; pedagogy (ie. teaching and learning) issues; professional development of teachers; and assessment and reporting issues.

The Carmichael Report : The AVTS

The Carmichael Report (1992) proposed the establishment of a new entry level training program - the Australian Vocational Training System (AVTS), which will provide a nationally recognised and portable vocational qualification. The aim is for all school leavers not undertaking tertiary studies to participate. In contrast to the existing apprenticeship system, older workers, re-trainees and re-entrants to the workforce can also become AVTS trainees.

The AVTS offers a number of pathways or combinations of education, training and structured work experience that lead to a qualification, another training pathway or a career step. The pathways extend from compulsory education through post-compulsory education and training, and between education, training and employment. The pathways will provide for credit for prior learning and for formal linking between different levels of courses or training programs.

There will be four levels of the Australian Vocational Certificate. The AVC Levels will equate with ASF Levels 1 to 4 (see below). Certificates will be awarded when trainees can demonstrate the competencies relating to each AVC level. Many trainees will receive two or more certificates as they progress from level to level⁸.

The AVTS is a competency-based system and will embrace both key competencies and vocational competencies - competencies specified by industry or enterprises which are required to do a particular job (see below). A competency based system involves different approaches to curricula, methods of teaching, assessment and certification to those

⁸ An AVC Level 3 roughly equates to a TAFE certificate. For example, a current trades qualification roughly equates to an AVC Level 3.

traditionally used. It is concerned with outcomes rather than inputs: for example, what a person can do in the workplace, rather than how long they spend in training. A trainee's competency is measured against defined competency standards, rather than being compared to the achievements of others.

In June 1992⁹ State and Commonwealth Ministers agreed to the introduction of AVTS pilot programs funded by the Commonwealth Government. As at January 1995 over 200 pilots had been approved covering a range of different training models.

In November 1994 State and Commonwealth Ministers agreed to the implementation of the AVTS to be phased in from 1 January 1995. At the time of writing the implementation timetable was still to be developed but top priority has been assigned to the translation of the apprenticeship and traineeship systems to the AVTS by the end of December 1996.

Other initiatives under the NTRA umbrella include:

National Training Board - In 1989 a Special Conference of Ministers of Training agreed to establish the National Training Board¹⁰ to assist industry in formulating industry competency standards and to endorse them for approval by state education authorities. The Ministers of Training also agreed to establish the National Office of Overseas Skills Recognition (NOOSR) to implement a new method of recognising migrant skills.

The Australian Standards Framework - The National Training Board is also responsible for the implementation and co-ordination of the Australian Standards Framework (ASF) which provides a national framework for the recognition of skills acquired by workers in industries regulated by industrial awards. The ASF is an eight level structure based on ascending competencies from the base Level 1 for a competent worker through to Level 8 for senior professionals or managers.

Competency Standards - Competency based standards for ASF Levels 1 to 6 are being developed by competency standards boards in almost all industries¹¹ and nationally endorsed by the NTB. As of January 1995, 53 per cent of the workforce were covered by industry competency standards. The NTB also endorses cross industry standards (e.g., in the clerical occupations, the small business sector and workplace trainers and assessors) and enterprise standards. Competency standards are also being developed in many of the professions by the NOOSR.

Competency standards enable industry and enterprises to define their workplace skill requirements, thereby providing benchmarks for the development and delivery of vocational education and training courses relevant to industry needs. Industry competency standards apply to particular industries or occupations, as opposed to the key competencies which are generic and apply to the education of all young people. The key competencies are included in industry competency standards.

⁹ At the same time the Commonwealth Government announced the introduction of Career Start Traineeships (CSTs), offering a more flexible range of training arrangements for young people than traineeships under the Australian Traineeship System (ATS) model (Allen Consulting Group, 1994).

¹⁰ The National Training Board is a private company, its shareholders include the nine Commonwealth, State and Territory governments.

¹¹ As at January 1995 a total of 47 competency standard bodies were operating.

Competency Based Training (CBT) - Industry competency standards underpin competency based training. To quote from a recent report on the NTRA:

"The objective of Competency Based Training is to move from a time-based system of training focused on inputs (infrastructure, staff, curriculum) and training providers to one focused on outcomes (what an individual can demonstrate that she or he can actually do in a work setting) defined by industry in terms of the skill needs of enterprises (expressed in competency standards)." (Allen Consulting Group, 1994, p.19)

CBT was formally introduced with the endorsement by the Ministerial Council of *A Strategic Framework for the Implementation of a CBT System* in 1990; and the *Competency-Based Training Operational Plan* in 1991 (Allen Consulting, 1994).

NFROT - National Framework for the Recognition of Training - In 1992 Commonwealth and State Ministers adopted the National Framework for the Recognition of Training (NFROT) which provides a framework for national consistency in the recognition of competencies and accredited courses, training programs and training providers. Each state has undertaken to ensure that its vocational education and training system meets the requirements of the NFROT agreement. NFROT will enable skills obtained by workers in one state to be recognised throughout Australia.

Under NFROT accredited training programs will be competency based; incorporate national competency standards; be assessable in terms of performance criteria; and provide for the recognition of prior learning. Achievements under the NFROT agreement include development of a national register of accredited courses, recognised training programs and registered training providers; agreement to grant reciprocal accreditation between state jurisdictions; and agreement for nationally operational registration of training providers (Allen Consulting Group, 1994).

National Qualifications Framework - The National Qualifications Framework, agreed to by Commonwealth, State and Territory Ministers of Education and Training in December 1993, aims to create a national set of qualifications (or credentials) in the vocational education and training sector, based on competency standards. The new system will eliminate many of the inconsistencies in existing qualifications between states and territories. The proposed model has six levels, based on four Certificate and two Diploma levels. As opposed to the current system, with fixed entry levels and emphasis on the duration of the training course, qualifications in the new system will be determined by:

- breadth and range of competencies demonstrated;
- depth and complexity of underlying knowledge and skills;
- application to familiar/non-familiar situations; and
- degree of supervision of, and responsibility for, the application of competencies (NTB, 1993).

The NQF is operational from 1 January 1995 with a 3 year transitional period.

The Australian National Training Authority (ANTA) - In 1992 the Commonwealth Heads of Government agreed to establish the Australian National Training Authority (ANTA¹²) with responsibility for the development of a national strategic plan for Australia's VET system and for the distribution of public funds. ANTA is to consult industry and advise Ministers on how vocational education and training can better respond to industry needs. The ANTA Board has strong industry representation. All funding from the Commonwealth, States and Territories for vocational education and training is now disbursed by ANTA.

ANTA commenced operations in 1994 and its four principal priorities were:

- to build a client focused culture within the vocational education and training system - in part by establishing a more competitive training market and encouraging greater industry involvement in developing and operating the national system;
- to create and promote opportunities for lifelong learning;
- to advance a national identity for the vocational education and training system; and
- to reward innovations and best practice approaches. (Moran, 1993a)

ANTA published a national strategy for VET in 1994 titled *Towards a Skilled Australia*. The strategy provides a statement about the intended direction of VET in Australia, agreed by the governments of Australia. It comprises a number of specific strategies designed to deliver responsive, quality, accessible and efficient vocational education and training.

The Strategy aims to ensure that future VET is: more flexible to accommodate the needs of industry as the principal client; more devolved, so that decisions are taken by those most closely attuned to the needs of clients; more competitive, to encourage improved quality; and more informed so that all parties are aware of the directions and details of change.

National Curriculum : ACTRAC - In November 1990 the Special Ministerial Conference on Training agreed to establish the Australian Committee for Training Curriculum (ACTRAC) to develop national curriculum for both institutional and workplace training and curriculum materials to support training provision. As of mid 1994, 41 national curriculum projects have been approved for nationally endorsed standards in 17 industries.

In addition to these measures, in 1989 Australia's state and territory education ministers issued the Hobart Declaration On Schooling in which they agreed to develop a national curriculum framework for schools. The Curriculum Assessment Committee of the Australian Education Council is developing a national curriculum framework comprising national statements and assessment profiles in 8 key learning areas.

Working Nation Initiatives - The Commonwealth Government's White Paper on Employment and Growth, *Working Nation* (May 1994) included a number of initiatives aimed at accelerating reforms in vocational education and training to produce a system which:

- ensures that training is relevant to industry needs and which engages industry in determining the direction of training reform;

¹² ANTA has been described as a new level of government sitting between the Commonwealth and the States.

- offers a variety of paths including traineeships based in schools, TAFE and industry, and which can be adapted to people at different stages of their working lives;
- is based on a competitive market, consisting of both public and private training providers;
- gives disadvantaged groups access to training; and
- is concerned with what individuals can do rather than how long they have spent in the system.

Working Nation outlined changes to entry level training arrangements including:

- a revised incentive structure to encourage employers to take on apprentices and trainees¹³;
- a proposal for a new system of training wages to apply where employers provide recognised training¹⁴;
- three new training paths:
 - student traineeships, to be administered by the Australian Student Traineeship Foundation¹⁵, enabling Year 11 and 12 students to combine general and vocational studies;
 - enterprise traineeships¹⁶ to enable large enterprises to undertake their own traineeships; and
 - labour market program traineeships to enable participants in labour market programs to gain recognised training;
- the expansion of traineeships to include adults for the first time; and
- development, in conjunction with the States and Territories, of a broad set of principles to increase industry's role in the national training system.

Working Nation included a target of 50,000 new entry level training places to be created by 1995-96 (funded by the Commonwealth) subject to the cooperation of industry, unions and the states.

A new Youth Training Initiative (YTI) for unemployed young people was also announced. Under the YTI, unemployed young people will receive intensive case management; increased opportunities for places in labour market programs and vocational training

¹³ \$2000 will be provided to employers for providing a one year training place; \$3000 for a two year training place and \$4000 for a three year place.

¹⁴ In June 1994, the peak employer group - the Australian Chamber of Commerce and Industry - agreed to a training wage plan negotiated between the Government and the ACTU. Under the plan employees are able to hire trainees on discounted wage rates ranging from \$270 to \$333 a week for adults and \$125 to \$133 for younger workers.

¹⁵ The Australian Student Traineeship Foundation (ASTF) is a national body aimed at bringing schools and industry closer together. It is responsible for developing and supporting school-industry programs through a network of regional training brokers. It will provide funding to local brokers to purchase off-the-job training for students as part of their courses. Funding will be available for up to 5,000 students by 1995-96. The scheme will provide the opportunity for apprenticeship and traineeship qualifications to be achieved in a shorter period after leaving school. (*Working Nation*, 1994)

¹⁶ An enterprise stream within the AVTS, developed by the Business Council, catering for the special training requirements of large enterprises. The enterprise system will enable large enterprises to develop their own standards and have them endorsed by the NTB; develop their own enterprise training programs which can be nationally accredited; and issue their own national vocational qualifications.

places; job search assistance and new income support arrangements to encourage young people to stay in education or training.

Measures announced in the White Paper aimed at encouraging flexibility and responsiveness within the VET system included:

- the establishment of a National Employment and Training Taskforce (NETTFORCE) aimed at promoting partnerships between employers, unions and community groups;
- development of a set of principles to underpin the establishment of the AVTS to ensure that:
 - the system is owned by industry and meets industry needs; and
 - the role of government is limited to coordination, quality control and managing change;
- plans to commence negotiations with the states and territories to increase industry representation on the National Training Board; and
- a number of measures designed to meet the special training needs of small to medium sized business.

THE KEY COMPONENTS OF THE NTRA

- the introduction of competency based training;
- the establishment of the NTB to oversee the development of industry competency standards;
- implementation of a national system of vocational education and training through the establishment of ANTA, implementation of NFROT and NQF agreements and development of national curriculum;
- introduction of new nationally consistent entry level training arrangements under the AVTS; and
- development of a training market and encouragement of greater competition between public and private training providers.

Chapter 3

IS THE NTRA WORKING?

The general consensus amongst both industry and the VET sector is that whilst the NTRA is headed in the right direction, progress has been slow and the new training structures are too bureaucratic, overly complex and irrelevant to the needs of many enterprises (Moran, 1993b, Allen Consulting, 1994, Edwards, 1994).

Nevertheless, considerable change has occurred. Achievements of the NTRA include:

- the development of national competency standards across a wide range of industries and the introduction of CBT in many areas;
- availability of accredited training in areas where it did not previously exist;
- successful implementation of many AVTS pilots;
- development of national curriculum;
- improvements to links between schools, TAFE and industry;
- acceptance of the training wage; and
- development of a number of innovative regional arrangements between schools, industries and training institutes aimed at meeting local needs. (Laver, 1994)

A major constraint on the pace of change has been the need to weld together the eight state and territory systems of VET into a single national system. Such an exercise is fraught with problems and is unlikely to occur quickly. Most of the reforms have required the agreement of State, Territory and Commonwealth governments, and implementation of the reforms has largely been the responsibility of the states, resulting in different approaches and rates of change. As well, the response of industry has varied with some industries being quicker to take advantage of the reforms (for example tourism and hospitality) than others.

This section examines some key areas of debate concerning aspects of the NTRA and VET in Australia. These are:

- the lack of industry involvement with the NTRA;
- the introduction of greater competition into the training market;
- the efficacy of competency based approaches to learning;
- the lack of emphasis on quality and assessment issues;

- the performance of TAFE; and
- the need to improve links between vocational and general education.

Lack of Industry Involvement

A significant area of concern has been the lack of industry engagement with the NTRA. The complex and bureaucratic nature of the NTRA has discouraged many enterprises from responding positively to the opportunities created by the reforms. For example, if a company wishes to establish base level training for employees it must deal with at least three bureaucracies - the National Training Board, the Department of Employment, Education and Training and a state or territory training authority - all with their own guidelines and procedures. This requires considerable resources and expertise - usually available only within large companies. In the eyes of many businesses the training reform process has been captured by officials of the Commonwealth and State governments, resulting in a system which fails to meet the specific needs of many enterprises.

The NTRA has created:

“... a complex system of interlocking committees and advisory bodies, made up of a small number of key players, and ad hoc approaches to implementation which rarely involved either the providers who might deliver the reforms or active involvement and ownership by a broad and inclusive base of firms. [However] it should be noted that this was an improvement on the myriad of unconnected processes which existed prior to this.” (Thorn, 1994)

The centralised nature of the NTRA with the primary emphasis on the establishment of uniform national standards has been criticised on the grounds that such an approach fails to take into account the diversity of industry needs and the competitive requirements of individual enterprises (Sloan, 1994 and Edwards 1994). Training needs vary significantly with enterprises and between industries. A unified national system may not provide the flexibility to meet such divergent training requirements.

A balance must be found between the need for national consistency, recognition and portability of qualifications with the diversity required to achieve effective provider client relationships which meet local industry needs. Competency standards should be kept at the general level so as not to be overly prescriptive. More attention should be given to industry specific responses and the needs of individual enterprises. The enterprise stream within the AVTS is an example of how local solutions can be integrated with a national framework.

There needs to be greater emphasis on training delivery at the local level with greater industry ownership of the process. This will involve closer liaison between schools, training providers and industry at the grass roots level, rather than as part of a national agenda. The Australian Student Traineeship Foundation, announced in Working Nation, aims to do this. Training design and delivery should be flexible with greater emphasis on modular based training offering particular units of courses relevant to specific needs. There should be increasing customisation of curriculum to meet enterprise needs.

A report by the Allen Consulting Group on implementation of the NTRA found that lack of relevance to individual enterprise needs was a major problem of the reform program and recommended a number of measures including the introduction of a user buys (or user choice) scheme to encourage greater client focus and ensure that training is responsive to the specific needs of local industry. The report recommends that enterprises and individuals involved in recognised contractual training have direct access to public funds¹⁷. According to the report, a variety of mechanisms are possible for making this operational - for example, nomination of the selected provider to the funding authority.

Another possible mechanism is the introduction of a voucher system - as has occurred in the UK. A general system of individual vouchers was rejected by the Allen Consulting Group¹⁸ and has been criticised by others on the grounds that it assumes trainees have the ability to shop around for training courses to meet their needs, that they always have the information to make the right decision; and that such a system overlooks the lack of attendances in many regions as well as in some areas of training. Another approach to establishing control at the local level is through direct local financial control over available training courses. (Hall, 1994)

Improving the relevance of the NTRA to industry can also be accomplished by more effective participation by industry in the VET system. Advisory bodies should be industry-led and communication structures between industry and the education system need to be improved. ITABs, set up to provide industry advice regarding VET planning and delivery, have not always been effective. Some industry representation bodies may not always contain sufficient experience at the enterprise level to provide effective input into developing statements of industry needs. One way of addressing this is to encourage senior industry representation on ITABs and ensure that those bodies are fully representative of the industries they cover (Moran, 1994). Commercial-in-confidence issues may also arise in highly competitive industries.

A More Competitive Training Market

A major element of the NTRA has been the drive to create a more competitive training market to improve efficiency within the VET system and encourage a greater client focus. The aim is to break down the monopoly held by TAFE in the provision of VET, reduce the role of government in training provision and foster closer provider/client relationships. These are objectives of the user buys approach referred to above. The idea is to stimulate the demand side of the market so the supply of training can better match client needs.

Achievements so far include reduction in the monopoly held by TAFE over recognition and accreditation matters and encouragement of the entry of private providers. There are now over 1,200 registered training providers. Increasing competition has also had positive effects in many TAFE colleges with the introduction of a number of innovative courses matched to local industry needs. (Thorn, 1994)

¹⁷ For the publicly funded off-the-job component of structured on-the-job/off-the-job entry level training (such as apprenticeships).

¹⁸ The report suggested vouchers only in the apprenticeship/traineeship area where there is a responsible employer or group training scheme. Vouchers would be provided to the employer and employee jointly.

However the concept of a training market is not yet fully developed and there is a danger of oversimplification. There are a number of different dimensions to training - for example, vocational preparation, retraining and upgrading workers skills, and training for the disadvantaged - all of which have different requirements. As well, training can be categorised according to the extent to which it is formal and structured; whether accreditation applies - either internal or external; whether it is entry level or ongoing; and how it is delivered, ie., in-house or by external providers. Market based approaches need to take into account the complexity of training provision.

Hall (1993a) points out that most training occurs on-the-job and not in TAFE. It is sometimes badly done, unstructured, narrow and rarely provides a career path. Hall argues that there is a need to upgrade the quality of informal on-the-job training so that it becomes formal. Rather than creating a training market *per se*, there would be three post-compulsory education sectors: universities, vocational colleges and employer-based on-the-job vocational education.

A frequent criticism of market-based approaches to resource allocation involving significant externalities is that markets rarely take into account long term needs. Hyman (1992) describes training provision in the UK during the 1980s which was market driven and heavily reliant upon the voluntary actions of employers and employees. The result was that employer training efforts were marked by complacency and short term considerations and training expenditure in most companies was low. Skill shortages had not been remedied and employer involvement in training had not significantly increased.

Such market based approaches assume considerable community of interest between employer and trainee - yet there is no guarantee that this will be the case. The Allen Consulting Group report acknowledges this point but concludes:

“... that while the interests of enterprises and individuals are different, they strongly overlap, and that indeed the interests of individuals can not be well serviced unless the training they receive meets the skill formation needs of enterprises.” (p.133)

Moran (1994) describes how governments in many other nations have developed a national skills formation strategy to overcome perceived deficiencies associated with reliance on market forces alone. These strategies differ in approach, but typically include new skills recognition frameworks and the promotion of a more flexible and responsive training market.

Whilst a greater market orientation may improve the efficiency and responsiveness of the VET system, governments still have an important role to play. In Australia this includes: provision of entry-level training; ensuring access to training for the disadvantaged; ensuring that the VET system meets the needs of SMEs; regulation of recognition and accreditation processes; and the encouragement of more effective links between industry and the VET system.

The Allen Consulting Group Report argues that central government roles should be kept distinct from service delivery roles in order to ensure efficient public sector performance.

"In respect of training this model points to the need to establish a clear-cut separation between the central functions of ensuring the operation of the training market, and planning for adequate levels of publicly provided or publicly funded training, on the one hand, and the function of delivering that training, on the other hand." (Allen Consulting Group, p.70)

Competency Based Learning

Whilst CBL is a means of ensuring that VET matches industry needs, it has been criticised on the following grounds.

First, it assumes that the primary role of the education system is to prepare a flexible and skilled workforce for industry. Other educational objectives, such as personal development and social progress, are considered less important.

Second, CBT is seen as a process of administrative reform rather than as a means of improving learning. According to Jackson (1993) competency based approaches to education have existed in the US since the 1970s without a significant improvement in the ability of the education system to meet industry needs. Rather, there is strong evidence that the adoption of CBT results in increased bureaucratisation and a system which is more cumbersome, time consuming and costly to administer. Industry involvement in the development of competency standards is essential but raises problems which must be resolved, such as concentration on short-term needs; problems of representativeness within employer groups - for example, different sizes and types of firms have different skill requirements; and difficulties with generalising performance standards in skill profiles developed by representative bodies as the basis for curriculum design.

Third, CBL has been criticised for being too narrow and prescriptive. The value of education in CBT lies in training students to perform skills determined by industrial representatives on competency standards bodies. Topics such as the nature of knowledge and its construction, the role of values in society, the nature of work, the effects of technology on society, power and control, and ideology are ignored (Stevenson, 1993). CBT measures performance in designated workplace situations - yet other equally important characteristics, such as imagination, character and personality - all of which it is the role of education to develop - are ignored. A crucial aspect of the competency movement is the notion of measurement - yet things such as communication skills, the ability to work in groups and problem solving skills are inherently difficult to measure (Pennington, 1993).

Sweet (1993) is critical of the wholesale adoption of the CBT paradigm in Australia which he argues has occurred because of an absence of a culture of scholarship and inquiry within vocational education¹⁹. There has been little research into how people most effectively acquire workplace skills and competencies. "There is very little scholarly interest in Australia in the . . . area of education and the workforce" (p. 83). According to Sweet, lack of research into how occupational skills are acquired, and insufficient ownership of the training reform process by industry, has meant that the key competency debate has been dominated by those concerned to classify, measure and report achievement - rather than by those interested in how to develop and use competence. More understanding is needed of

¹⁹ Sweet points out that this is in contrast to the US and continental Europe where there is significant research into the study of learning at work.

how to better **develop** key competencies in the workplace and in institutional VE programs, rather than how they can be put into national frameworks.

If CBT is used appropriately it can help ensure that training matches industry needs. The challenge is to find the appropriate balance between a creative learning environment for young people on the one hand, and the economic demand for a more highly skilled and adaptable workforce on the other.

" . . . competency-based training has become the 'main game'. It is really a 'side-show' (albeit important) and the success of the training reform agenda should not depend upon how widely competency-based training has been embraced . . . Competency standards (of a sensible quality, developed and tested in the workplace, and of practical use to both trainer and trainee) based on outcomes which are assessable must, without question, form an important part of the assessment of training. But the assessment of underpinning knowledge and understanding as well as of values, by more appropriate means, must also be part of the overall assessment of attainment." (Hall, 1994, p. 11)

Quality and Assessment Issues

Considerable effort has gone into establishing national standards and curricula - but assessment and quality control issues have not received as much attention. The NTRA has "got bogged down in the competency debate" (Hall, 1994). Quality assurance measures need to be introduced and a new approach to assessment implemented.

The national strategy for Vocational Education and Training includes a plan for the development of national best practice measures in VET. As well, by 1996, providers and agencies receiving public funds will have in place quality assurance arrangements determined by the State or Territory. A number of other measures aimed at improving the quality of all aspects of training design and delivery are also included in the strategy.

TAFE

Significant problems exist within the TAFE system. The centralised nature of funding and decision making limits the ability of individual colleges to respond to local client needs. Closer links with industry should be developed and training delivery should be more flexible - at times, in locations and using methods which meet the requirements of particular client groups. Courses should be customised to meet individual enterprise needs. Richard Sweet has argued that too much emphasis is placed on TAFE as the major provider of VET, rather than developing more effective pathways between the education system and the workplace.

Nevertheless, considerable change has occurred within the TAFE system in recent years. A number of innovative training programs designed to meet local industry needs have been developed and provide useful models. These programs are designed and accredited by TAFE in collaboration with a company or industry group for delivery in the workplace. They offer quality training which is relevant to company needs and which provides employees with nationally accredited qualifications. Examples in Victoria include: the Bachelor in Applied Science (Technology Management) offered by Deakin University and Box Hill College of TAFE which is delivered to employees of major companies including Ford, BHP,

BP, Australia Post and Mitsubishi (by licence to Regency College of TAFE in SA); and the Advanced Certificate in Supervision - a joint project of Deakin University and Ford Australia (Smith, 1994).

Integration of Vocational and General Education

There is a general consensus that vocational and general education should be better integrated at the secondary level to prepare students not going on to higher education for the world of work. The Deveson Report (1992) found that, despite the existence of some cooperative arrangements, there is in general too great a separation between sectors within the education and training system. A strengthening of vocational training occurring in schools was a key recommendation of the report.

To date some progress has been made in establishing closer links between schools and the VET sector, including the articulation of school programs with vocational options - for example the Pathways Project²⁰ in NSW, and the Australian Youth Traineeship Foundation announced in *Working Nation*. There have also been moves in higher education to build greater cooperation with industry in programs such as cooperative degrees and research, and to develop better articulation from TAFE Associate Diplomas to degrees and post graduate courses (Smith, 1994). As well, the implementation of the key competencies and AVTS pilots is introducing CBT pedagogy and assessment into the subject curriculum of Australian schools.

However, the flexibility of senior secondary schooling in Australia is limited to some extent by the current emphasis on preparation for university in curriculum, assessment and certification procedures. Schools must meet the requirements of state accreditation authorities which largely reflect the academic disciplines taught in universities.

Richard Sweet argues for the development of a model of education and training which combines general and vocational education and which is not classroom based and not based in TAFE. A range of flexible models of general vocational education should be developed which integrate school and industry with a common certification system and offer viable career opportunities for graduates of the school system. (Smith, 1994)

A recent report by the Schools Council (1994) describes widespread change occurring in upper secondary education and recommends integration between the general and vocational elements of all post compulsory curriculum²¹. Moves towards establishing a national framework of standards and pathways and a feasibility study of the possible establishment of an Australian Year 12 certificate are also suggested.

²⁰ The HSC Pathways program allows students to simultaneously study for the HSC and an accredited vocational certificate in areas such as tourism, microcomputing, design and horticulture. Students are taught industry-approved skills to enhance their employment opportunities. The vocational certificate serves as the basis for further TAFE courses and there is a credit transfer system between the states. In addition, students are eligible for a Tertiary Entrance Rank for their combined studies with which they can apply to study at university. In 1994, 500 students at 15 NSW TAFE colleges were studying under the Pathways approach. It is projected that 9,000 students will be involved by the year 2000. (Clout, 1994)

²¹ The report argues that such an approach avoids the marginalisation of vocational courses in schools which may occur if separate general and vocational curriculum were offered.

According to the report three major institutional changes are needed to enable schools to provide more flexible senior secondary schooling. These are:

- schools will have to exert a greater authority over upper secondary school education programs than in the past;
- industry and industry training authorities will have to specify needs and standards more explicitly than they have done in the past; and
- tertiary education providers will have to be much more flexible, innovative, and client sensitive in how they select, and in how they teach, than previously.

For integration to succeed however, "the community (particularly parents) must understand that senior secondary education to year 11 and 12 is a further level of mass education and that it has a generalised vocational role as well as a university preparation role" (Morrow, 1994).

Mansfield (1994) points out that whilst the ACTU supports the inclusion of vocational pathways in secondary schools and colleges, such pathways raise significant problems such as the need to find employers willing to provide work experience for students; the experience must be structured to ensure that worthwhile competencies are acquired; schools will require more resources to develop vocational placements; and issues such as supervision by the school of the quality of training, proper selection of workplaces, compensation for injuries, and the question of remuneration of school students doing placements will need to be resolved. Whilst the current emphasis on school-based vocational pathways is important, employment related vocational training is also important and shouldn't be overlooked.

However, moves to greater integration should not be at the expense of the quality of general education. Industry wants young people with a good general education as well as general workplace skills.

"Industry is seeking a redefinition of the concept of a general education, to reflect the demands that society will place on students rather than to supplant the valued ideal of a general education with a narrower and less creative approach" (Costello, 1994)

Conclusion

In recent years significant reform has taken place within VET in Australia in order to make the system more efficient, responsive and relevant to industry requirements for a skilled and adaptable workforce. Much progress has been made including substantial increases in school retention rates, introduction of CBT, development of a national approach to VET and encouragement of closer links between industry and the education system.

However, considerable problems remain. In order to address many of these, in November 1994, the Ministerial Council endorsed an Implementation Plan for measures contained in a report by ANTA titled *Proposals for More Effective Implementation of the Training Reforms*. A summary of the objectives of these proposals is contained in Appendix 2.

Transition teams were established under the leadership of Mr Stuart Hornery (Chairman of Lend Lease Corporation and a member of the ANTA Board) in the following five areas: training structures; competency standards; recognition of training; assessment; and user choice strategy.

Recommendations based on the work of the transition teams were submitted to the ANTA Board on 19 April, 1995. A final set of recommendations were being finalised by the Board for consideration by the Ministerial Council in May 1995.

Significant improvements to VET in Australia have already occurred. The present task is to evaluate recent changes and modify and refine them to ensure that the fundamental objectives of the reform program are met. To this end a number of recommendations for improvement are contained in Section 4.

Chapter 4

FINDINGS AND RECOMMENDATIONS

1. Australia's vocational education and training system should become more client focused and responsive to the specific needs of individual enterprises. There should be greater emphasis on establishing direct relationships between the client and provider within a national framework of recognition and accreditation.
2. The high degree of bureaucracy and complexity within the present system should be reduced to make the system user friendly and facilitate access to training by all enterprises and individuals.
3. There should be a greater focus on the provision of training at the local level. Strategies could include: devolution of relevant functions from central agencies to regions and local providers; provision of funds for initiatives such as collaborative programs between schools, TAFE and local and regional employers; and the development of funding parameters which encourage local initiative within a broad curriculum framework. However, moves towards greater local emphasis should not be at the expense of national consistency.
4. Industry competency standards should become more relevant to industry and enterprises and be kept at the general level. The standards should be expressed in terms of broad competency frameworks providing a common format rather than as an inflexible hierarchy of skills.
5. CBT should be aimed at meeting the specific needs of individual enterprises.
6. More competition in the provision of training should be encouraged so as to increase flexibility and client responsiveness. Investigation of the feasibility of the "user choice" approach is endorsed.
7. Strategies to ensure greater flexibility of training design and delivery should be adopted, for example, development of course modules, customisation of curriculum and delivery of training in locations, at times and using methods matching the requirements of particular enterprises.
8. Improvements to the structure of industry input into the education and training system are required. Representative mechanisms should be improved and advisory boards should be industry driven. Representative committees should have a greater focus on output, be more accountable for resources and have greater performance evaluation by users.
9. Measures to ensure that the training needs of small and medium sized businesses are met should be implemented. Such measures could include further encouragement of Group Training Schemes to assist small business in accessing the system and the

development of modular training units. Simplification of the VET system would also help small business.

10. The centralised nature of TAFE funding and administration should be modified to facilitate local responses to client needs.
11. There should be greater integration of general and vocational education in schools so that all year 11 and 12 students are offered accredited vocational options (without affecting opportunities to undertake tertiary studies) and flexible pathways between schools, training institutions and the workplace should be developed.
12. Greater consistency between senior secondary arrangements in the different states and territories should be encouraged to strengthen the vocational preparation role of schools and provide a more structured link between schools and industry.