SCHOOL, TAFE AND UNIVERSITY LINKS, IN PURSUIT OF A SEAMLESS PATHWAY

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Index: Partnerships, schools, TAFE, university; seamless educational pathways

Abstract: The Hunter Institute of Technology is the largest supplier of workforce education and training in the Hunter Region of NSW, and one of the largest NSW TAFE Institutes.

One of the Institute's 16 campuses, the Central Coast Campus, is a joint venture of the University of Newcastle, The Hunter Institute of Technology, and the Central Coast Community College. In a number of other locations joint school and TAFE educational precincts are in various stages of development.

The Institute, in partnership with local schools and the University of Newcastle, has an established goal of developing educational pathways, which maximize student articulation and credit transfer. The movement from traditional articulation arrangements to those incorporating the concept of a seamless pathway represents a challenge for these partners.

The Issue Of Seamless Education.

Within the broader operating environment of the Hunter Institute of Technology, the creation of seamless education and seamless educational pathways has emerged over time as policy and planning issues.

These issues are arising in Australia at both the national and state levels, for example:

- An objective of Australia's National Strategy for Vocational and Education and Training 1998 2003 is to enhance mobility in the labour market. To this end "Seamless post compulsory pathways will be developed so that students will be able to move freely within the vocational education and training system, and between the system, senior secondary schools and universities." (ANTA, A Bridge to the Future p3)
- The Victorian State Government has established a Ministerial Committee on Seamless Education and Training. This committee will develop strategies across all compulsory education and training sectors to remove barriers to achieving a seamless education and training system in order to maximize educational mobility for all Victorians. (OTFE *Learning for Life* p1)
- Dr Ken Boston, Managing Director of TAFE NSW and Director-General of Education and Training has consistently proposed that within his portfolio the different points of focus and emphasis along the continuum of lifelong learning are no longer served by being rigidly compartmentalized into discrete elements. Barriers, which have prevented the use of, appropriate teaching staff, curriculum and facilities along the continuum of learning should be removed. (Boston, "Why Schools and TAFE Need This New Award" p4).
- The strengthening of links with schools, universities, other training providers and industry to create valued educational and employment pathways is a key strategic direction of TAFE NSW. (*TAFE NSW Strategic Directions 2000-2002, p2*)

A quick search on the web indicates that similar issues are being confronted in other locations for example:

- In establishing his Education Reform Study Commission in June 1999 Georgia 's Governor Barnes called for the commission to {..." create an education system that is truly seamless and refuses to allow so many students to fall through the cracks. The red tape and bureaucratic roadblocks and bureaucratic turf-guarding that keeps students from taking advantage of all that high schools and technical schools and two-year colleges have to offer must be eliminated." | (Georgia State Plan for Vocational and Technical Education: FY 2001 FY 2004 p3)
- In New Zealand the development of the National Qualifications Framework and new school curriculum is viewed by the government as part of its vision of a seamless education system which allows educational opportunities to flourish and to build an education system for the twenty first century. (Ministry for Education, New Zealand, *Education in the 21st Century p1*)
- In support of the government's "one-through road" education policy the Hong Kong Institute of Education plans to develop kindergarten, primary and secondary schools at its Tai Po campus. (Hong Kong Standard, 2000)

What Then Is Seamless Education?

Although there does not appear to be a universally accepted definition of seamless education, common themes are evident. The following quotes from the Victorian Office of Further Education and Training (OTFE), capture the core themes.

... "Seamlessness refers to the openness of sectors of education and training

to individuals from a range of educational backgrounds. A seamless education system is one in which each sector, while maintaining its distinctive purposes, has multiple points of entry and exit and thereby encourages lifelong education.

...It will address structural barriers between the school, TAFE, higher education and community sectors to ensure that individuals are able to move freely between the sectors on the basis of their prior learning and current competence.

...is a critical requirement of an education and training system that provides individuals with access to learning throughout their lives." (OTFE p1)

Seamlessness should be viewed from the perspective of the learner and seamless educational pathways are considered one of the necessary features of such a system.

The translation of these concepts into actual implementation of operational strategies and practices poses many questions at both macro and micro levels. For example, how would such a system be resourced? Would it require a restructuring of educational portfolios or structural changes to the supporting administrative systems? Is the concept contradictory to that of a competitive educational market? How will deviations, exits and entries along pathways consistently accommodate work and life experiences? What is the determinant of the speed at which an individual progresses? There are many such questions. Seamlessness is not a simple concept, and perhaps this is the reason that some governments are creating advisory committees and bodies to assist with the clarification, development and implementation of the concept.

Pursuing A Seamless Pathway.

There are significant challenges to be addressed if such goals are to be achieved. In the operational environment of the Hunter Institute the challenges that we face are not unique. Generic or common issues are clearly identified in a number of the papers including those of Doughney (1999) and Leahy (1999) presented at the First National Policy Conference of the Lifelong Learning Network, *Post-compulsory Education and Training; Looking to the Future. August 1999, University of Canberra.* The issues are consistent with Teese's (1999) report to the Victorian State Training Board. Identified issues include:

- TAFE Institutes are funded and accountable to the state government whilst universities are funded and accountable to the commonwealth government.
- Student aspirations and perceptions of the relative importance of higher education as opposed to vocational education.
- Attitudes differ between institutions and although the development of multisector institutions has widened opportunities, student mobility may be limited to localized arrangements. Localized arrangements may also lead to variations in arrangements and standards.
- Partial credit transfer arrangements do not represent a well-defined pathway.
- The introduction within the VET sector of National Training Packages, comprising competency standards, qualifications and assessment strategies may pose difficulties for universities in determining articulation arrangements.
- Differing staff employment conditions between the sectors can prejudice the operation of a seamless approach.

One factor, which directly impacts on the ability to move towards the creation of a seamless pathway, is the level of local cross-sectoral links and arrangements between the school, TAFE and University sectors. It is at this level where the Hunter Institute of Technology has concentrated its effort.

Partnerships And Pathways For The Hunter Institute Of Echnology.

The Hunter Institute of Technology has a number of structural features which are conducive to providing a seamless pathway along the traditional school, TAFE and University sectors.

First, all TAFE Institutes and schools in NSW are part of one government entity. The Department of Education and Training spans the continuum of education from early childhood education to TAFE and community education.

Second, in a number of the 16 delivery locations of the Institute there are several locations where schools and campuses are on adjoining or common sites and consequently educational precincts are in various stages of development.

Third, one of the Institute's campuses, the Central Coast Campus, is a joint venture of the University of Newcastle, the Hunter Institute of Technology and the Central Coast Community College.

These structural features facilitate partnerships (though not necessarily educational) arrangements and links. There is no guarantee that co-location will deliver seamless pathways.

The Traditional Approach To Educational Pathways.

The Institute and its partners have traditionally approached pathways on the basis of credit transfer arrangements from school to TAFE and from TAFE to university. Although this type of arrangement can lead to a pathway it is likened to one with a series of gates separating the three sectors. To move from one discrete sector to another the student must approach a separate gate where credentials are checked, credit given for certain parts of previous study, entry permitted and a new course undertaken in the new sector. Such a pathway is primarily based on one way traffic, with an assumption of an educational hierarchy.

These arrangements have in their own right been very successful. There are extensive school/TAFE credit transfer arrangements, which have been established on a statewide basis. Joint School TAFE programs have also been a feature, 3000 school students in 1999 undertook vocational programs delivered by the Institute.

TAFE/University credit transfer arrangements exist on a statewide basis and also are extensive. These arrangements have been significantly improved by direct interaction between individual Institutes and local universities. In the case of the University of Newcastle and the Hunter Institute of Technology 41 out of 46 of the University's degree programs have credit transfer arrangements from TAFE studies to the University. The majority of the arrangements are based on the successful completion of the TAFE course and TAFE students must meet university admission requirements and gain selection. Arrangements are also in place for the recognition of University subjects within Institute programs. The success of these arrangements can be seen in relation to students moving along a pathway from the Institute to the University of Newcastle, where:

- There has been an increase in offers and enrolments by TAFE sourced applicants every year since 1996.
- In the year 2000, of the 287 TAFE sourced enrolments, over 70% came from Hunter Institute Campuses, a similar figure to 1999.
- 37% of this year's TAFE sourced enrolments were TAFE students in 1999 (up from 35% in 1999).

It is interesting to note that 1323 university graduates enrolled in the Institute in 1999, and a further 1913 enrolled who had started but not completed a degree program. The Institute had 50387 enrolments in the year.

The Movement From Traditional Arrangements In Pursuit Of A Seamless Pathway.

Despite the unique structural arrangements the Institute and partners have at this point not been able to create a truly seamless pathway. It has been our experience that the challenges or barriers that are listed above do exist and the degree to which they can be overcome is variable. The movement from variations of the traditional arrangements is difficult. However, in a number of areas there has been significant progress.

The introduction in Semester 1, 2000 of the Bachelor of Applied Information Technology at the Central Coast Campus represents a significant change from traditional credit transfer pathway arrangements. The Campus is a joint venture between the University of Newcastle, the Hunter Institute of Technology and the Central Coast Community College. These partners envisaged that the Campus would offer a "seamless web of education". (*Campus Review* 1997). Consistent with

this vision the Director of the Central Coast Campus initiated the development of the Bachelor of Applied Information Technology program.

The Bachelor of Applied Information Technology has broken new ground in cooperation between the University and Institute and introduced a new dimension to the concepts of articulation and pathways. The program integrates TAFE and university studies.

The degree offers Information Technology (IT) subjects, together with a major study in another discipline of the student's choice, from a broad range available at the Campus. The degree allows students to combine their degree major with the critical underpinning of IT, for example marketing/IT, human resource management/IT, hotel management/IT. University and Institute IT staff were parties to the development of the program and undertake the teaching and coordination of the IT component. For the students it is an apparently seamless program. IT modules across two of the three years of the degree program are drawn from TAFE curricula and taught by Institute staff. Approximately one third of the program, overall, is drawn from TAFE components and delivered by Institute staff.

If students choose to convert their study from the Bachelor of Applied IT to one or more TAFE qualifications, credit is given for those IT subjects already successfully completed. Students who have completed one or more TAFE qualifications are granted credit consistent with the University/TAFE articulation arrangements.

In the development and implementation of this program the issues clearly identified by Doughney (1999) and others were encountered. Many were able to be overcome by the fact that the Central Coast Campus has one administration, common facilities and infrastructure. However the program is not a seamless pathway but rather a seamless program. For the Institute and the University it is an extremely innovative integrated program, which is forcing us to address the administrative and educational issues which must be overcome if a pathway is to be truly seamless.

Administrative issues have in the main been overcome by the fact that the course is a university program, managed by the University and the students enrol in the degree program. The TAFE IT modules have been packaged as 8 university subjects but the students must also enrol in the Institute, pay the Institute administrative charge, and receive both TAFE and University results. Student attendance is in accordance with the university calendar (which differs from the standard TAFE calendar). This is not a problem for the students as all activity occurs within the environment of a completely integrated campus, however, it has required considerable initiative and flexibility by the staff of the teaching and administrative sections.

The program was designed to blend vocational and academic skills, TAFE providing the vocational emphasis "computing for the here and now" which is then built on by the university subjects. All TAFE IT subjects are in the first 4 semesters of the 6 semesters. An essential component was the maintenance of the pedagogical practices of TAFE: smaller classes, teachers with an industry background and orientation, a practical and hands on emphasis, classroom interaction and individual attention. The students, although in the strict sense university students, when undertaking TAFE subjects were to be taught and treated as TAFE students. In practice this has presented a major challenge for the TAFE teachers in adopting an appropriate teaching strategy. Many students when entering the program view themselves as university students expecting a large scale lecture situation with optional attendance which is in contrast to small interactive TAFE classes with more continuous assessments. TAFE teachers consider the program a stimulating program in which to work. The potential problems arising from the different cultures of TAFE teachers and University lecturers has largely been overcome due to a "one staff" management philosophy of the Director of the Campus.

Formal evaluation of the program will occur in line with standard accreditation procedures and there will be ongoing review. In relation to the seamlessness of the program and in the context of a

seamless pathway there are a number of improvements and modifications that will need to be accommodated. Entry and exit points for the program are essentially limited to entry to a degree program, with standard credit transfer arrangements, exiting with degree, TAFE statement of attainment or partial completion of each. The program is localized within one faculty and campus, yet this may be an advantage in a competitive education market.

Consideration is already being given to these issues including the integration of vendor qualifications (one of the Institute campuses is a Regional Cisco Academy) and connection of elements of the program to another degree program. At a time of the broadening of the NSW Higher School Certificate and an increased emphasis on vocational education within the school system, the involvement of schools and school students is also under consideration. Submissions have been made to secure funds for technology to enhance cross sector training and will potentially provide the mechanisms to improve the seamlessness of the program and also move it from its current localized base.

CONCLUSION.

The Hunter Institute of Technology does not operate within a seamless education system nor does it have seamless pathways. However the concept of seamlessness is recurrent at all level of operations and is causing us to rethink our traditional ways. Whilst there may be structural barriers to a seamless education system and pathways, and the concept itself may not be clearly defined, it is a concept which can be used to challenge existing arrangements. It may well be something that is not attainable, but rather something to which to aspire. Close links and partnerships with schools and university have enabled the Hunter Institute of Technology and partners to develop programs and pathways that exhibit many of the characteristics of seamlessness. The Bachelor of Applied Information Technology is such a program and presents an exciting opportunity for students and teachers. Whilst it cannot be the sole criterion, the aligning of programs and pathways against this concept of seamlessness can only add to the value of the program. The Institute will continue to build on these programs and with its partners pursue a seamless pathway.

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