Mine! No Mine! A critical analysis of cross-sectoral design

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Abstract

Reviews of the tertiary education system in Australia highlight the need for greater integration between the vocational and higher education (HE) sectors. Historically, the sectors have been established with distinct funding sources, governance structures, employment conditions, student characteristics, learning outcomes and curriculum design (Karmel 2008). A variety of organisational structures shape current cross-sectoral programs and pathways, including co-located dual-sector institutions, degree program offerings in TAFE colleges and specified credit and articulation arrangements between vocational institutions and universities. Despite the potential for such structures to widen participation for educationally disadvantaged groups, tertiary participation rates for Indigenous people, people from regional and remote parts of Australia and those from low socioeconomic backgrounds have not improved (Gale 2009, Wheelahan 2009, Bradley et al. 2008).

This paper presents a framework for the design of regional HE courses and pathways in a community context. The framework draws from community-based participatory research methodologies and includes a critical analysis of underlying drivers, barriers and enablers to regional delivery. Structures and processes are proposed for gathering the varied and often contradictory views of educational institutions and local communities, and for incorporating these views into the design of regional pathways and courses.

Community-based development of regional programs entails new forms of engagement for educational providers, government bodies, business and communities. The framework presented in this paper is proposed as a sustainable approach to the development of cross-sectoral pathways and programs to address the needs of the most seriously under-represented groups in regional Australia.

Introduction

The Australian education system historically comprises loosely connected school-based education, vocational training (VET) and higher education (HE), with separate governance structures and outcomes established for each sector. While there has been longstanding interest in student pathways between education sectors, especially in addressing national skills shortages through vocational and HE pathways, a number of perceived barriers inhibit cross-sectoral partnerships. State and territory government departments independently shape school curriculum, delivery structures, student fees and staff employment awards. Vocational institutions are also managed through state and territory education departments, yet follow a skills-based national curriculum. In

contrast, HE institutions operate 'autonomously' within a centralised system that controls funding, standards, evaluation and reward mechanisms.

Historically, collaboration between VET and HE institutions has focused on the development of articulation and credit transfer arrangements that provide cross-credit between completed qualifications. Credit arrangements commonly function as linked single sector awards delivered sequentially in VET and HE institutions. Only a minority of programs operate as concurrent, jointly delivered dual-sector awards. Research carried out by Harris et al. (2005), the Australian Government (MCEETYA 2006) and PhillipsKPA Pty Ltd (2006) has resulted in best practice principles for the development and management of VET-HE articulation and credit transfer arrangements. Formally agreed cross-credit arrangements have the potential to expand student opportunities and pathways, promote consistency and currency of information, grant credit at enrolment and enhance success and retention rates for students following related courses (Cram 2008).

Rich cross-sectoral student experiences can be achieved through co-located VET and HE campuses in dual sector institutions, which are governed jointly to promote cross-sectoral pathways. Degree programs auspiced by a university and delivered on a TAFE campus, or delivered between two campuses simultaneously, are also becoming widespread. These programs are generally created with fixed curriculum, often in Business or Management, with TAFE delivering the majority of first year subjects and the university increasing its delivery in Years 2 and 3 (see, for example, TAFE NSW).

Australia's sparse population in regional areas poses 'real challenges in ensuring equity of provision across vast distances' (Bradley et al. 2008 p.2). Cross-sectoral education presents opportunities to raise access, participation and achievement rates for educationally disadvantaged groups, particularly those from low socioeconomic background, Indigenous groups and people living in regional and remote Australia. However, few of the available cross-sectoral structures are accessible to students living outside metropolitan areas. Even when pathways are provided, students from low SES backgrounds are less likely than other groups to access the higher levels of vocational education or to transition from VET studies to HE (Wheelahan 2009).

This paper presents a framework for the design of courses and pathways that promote access, participation and attainment in tertiary education for people living in regional NSW. While the paper does not define the scope of 'tertiary' education, the term 'vocational pathway' is used to describe progression through Certificate-level courses and 'VET-HE pathway' for progression from Certificate IV-Diploma to HE. Barriers to participation for regional communities are acknowledged and addressed. Other challenges, including 'Mine! No Mine!' perceptions of cross-sectoral difference and defence of 'thin market' share are also addressed. The framework challenges negative perceptions and proposes strategies for bringing equity-based education to regional towns through community engagement, evidence-based practice, application of innovative problem-solving approaches and design of effective operating structures.

Methodology

The program *Pathways to enhance regional participation in HE (Regional Pathways)* was established[1] at the University of Canberra (UC) in 2009 following critical consideration of national and institutional drivers for equality in educational achievement in Australia. Communities in Bega Valley, Eurobodalla, Snowy River, Cooma-Monaro, Goulburn-Mulwaree and Shoalhaven Shires were invited to participate in the program.

The objectives of the Regional Pathways program incorporate a number of integrated elements:

Design of courses and pathways	*to increase* access, participation and attainment in HE	*for* people living in S-E NSW,	*targeting* equity groups: Indigenous /low socioeconomic status (SES) / regional	*through* university-community and cross-sectoral education engagement.

The key research questions investigated in this paper are:
- What is the potential for cross-sectoral development of programs in the S-E NSW region?
- What are the barriers and enablers?
- What structures and processes are required to ensure consistency and sustainability?

The methodology combines community-based participatory research (Seifer and Greene-Moton 2007) and university-community engagement approaches (e.g. Garlick 2000; HEFCE 2002; University of Cumbria 2010) with critical analysis of educational quality (Skelton 2005) and integrative research (Bammer 2006). Evidence and ideas have been collected through a review of national and international literature, community forums and reflective conversations with key players from government, business, education and regional communities.

Review of barriers and enablers to regional participation

The design of cross-sectoral programs for regional delivery is of national interest and aligns with strategies proposed by the Review of Australian Higher Education:

> *Australia needs a sustainable system of higher education provision in regional and remote areas. Provision needs to be flexible and innovative. It must anticipate and respond rapidly to local needs. Providers in regional and remote areas need to be encouraged and supported to build upon partnerships with local communities, providers in other sectors of education, businesses and industry. Such arrangements will involve institutional cross-collaboration and partnerships, including sharing the use of facilities and resources. (Bradley et al. 2008, p.111)*

However, program objectives are ambitious. Despite many years of funding for equity initiatives, *'people from lower socio-economic backgrounds, those from regional and remote Australia as well as Indigenous Australians are under-represented in higher education compared to their incidence in the general population'* (Bradley et al.,

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[1] Funded by the Australian Government Department of Education, Employment and Workplace Relations

2008, p. 27). Historical barriers to regional participation in HE include general regional disadvantage and the under-representation of low socioeconomic groups.

Regional disadvantage

The Regional Pathways program aims to create new educational opportunities for people living in six Shire Council areas: Goulburn-Mulwaree (ABS 2006 population 26,092), Cooma-Monaro (9,726), Snowy River (7,190), Bega Valley (31,059), Eurobodalla (35,014) and the town of Ulladulla (6,240) in the Shoalhaven. An educational audit carried out before the program began in 2009 found that Diploma-level programs were delivered by TAFE in five of the seven participating towns. One town also supported a university-managed Education Centre. While TAFE collaborated with a number of regional employers, no joint VET-HE programs were reported. The number of Diploma level offerings in regional towns has risen during the project period – with TAFE offering 11 Diplomas in Goulburn, 10 in Cooma, 3 in Jindabyne, 6 in Bega and 4 in Moruya in 2010 – and opportunities for jointly delivered courses with the University are expanding. TAFE also reports continuing expansion of TVET delivery courses into regional high schools.

Socially and economically, regional delivery of tertiary education conveys a range of advantages for individuals. The NCVER estimates that a Bachelor degree provides a lifetime rate of return of 15 per cent a year for men and 17 per cent for women (Beddie & Curtin 2010) and the achievement of a Diploma-level qualification is also significant. While it is recognised that some students who complete school in a regional town will choose to leave home to attend a city-based university, the Regional Pathways program is designed to enhance participation of the 'other 83%', young school leavers and mature aged community members who have not traditionally engaged in higher learning. Furthermore, local development of enhanced knowledge and skills can contribute to long-term economic development in the town.

Under-representation of low socioeconomic groups

Groups from lower socioeconomic status (SES) and those from families with lower levels of education and occupation participate less in higher education than other groups. When low SES groups live in regional areas, the level of disadvantage increases. Moreover, the range of regional course offerings is considerably narrower than the range offered in urban areas, including areas designated low socioeconomic status (Australian Government, 2010, p.18).

The National Plan for Equity of Access to Higher Education 2008-13 (DEEWR) has proposed performative measures for improved *access* (proportion of a given cohort that has commenced tertiary education at a given time), *participation* (proportion of a given cohort enrolled at tertiary institutions at a given time) and *attainment* (proportion of a given cohort that has completed tertiary education). These measures support achievement of the Australian Government's target of 'at least 40 per cent of 25-34 year-olds attaining a qualification at bachelor level or above by 2025', with a reduced target of *20 per cent* by 2020 for people from low socioeconomic status (SES) backgrounds (Bradley et al. 2008). An initial analysis of educational achievement and outcomes in the S-E NSW region confirms that the HE participation rate for 15-25 year olds is considerably lower than the State average of 16%. While around 9% of young people enrol in university studies in one Shire, the remaining Shires average less than 4% participation for the 15-25 age group (ABS 2006).

Social research carried out by Tony Vinson (2007) suggests a range of factors associated with educational disadvantage: family attitudes, poor school experience, low educational attainment, poverty and distance from providers. The Regional Pathways program addresses under-representation of low SES groups by incorporating community-based equity initiatives that encourage existing students to remain at school and support the re-entry of disengaged students into education.

Advantages of university-community engagement

The Australian Universities Community Engagement Alliance (AUCEA) Position Paper 2008-2010 notes:

> *Engaged universities are essential for Australia's economic and social future. Beyond traditional views of universities as places where teaching and research occur, Australia's higher education sector must ... directly and intentionally contribute to national interests and priorities ... By its very nature, engagement is influenced by the alignment of university strengths and community contexts (p. 2).*

For many universities, regional engagement is concerned with promotion, brand management, recruitment and achievement of equity targets. The university-community engagement approach adopted by the Regional Pathways program expands the university's partners and supporters in the Capital Region, most notably with TAFE NSW and Shire Councils. Long-term engagement activities aim to create mutual benefit, build community trust and manage community expectations while ensuring program sustainability. Communities gain from new knowledge, inclusion of local perspectives and enhancement of existing skills and infrastructure. In turn, the University has gained from a *demand driven* approach that builds on local strengths and opportunities to design new teaching and learning programs in rural health, applied science, early childhood education, entrepreneurship and work integrated learning. Community-based research opportunities are also created through this engagement.

Cross-sectoral differences

Perceptions of cross-sectoral difference have inhibited the expansion of VET-HE courses and pathways in regional areas. Schools focus primarily on the retention of young people to school leaving age and preparation for post-secondary learning. Vocational providers, particularly in regional areas, are expected to meet local skill and innovation needs. University qualified people often move into regional areas *after* completing their studies, and HE study is not always valued. In regional areas with small populations, each sector is concerned with keeping its market share, especially when there is competition from private providers. As a result, the arrival of a university in a regional town can be viewed as an unwelcome intrusion, even though the development of learning pathways may attract a new student population.

Schools, vocational providers and universities acknowledge sectoral differences in governance structures, policies and decision chains. Student learning experiences also differ, with classroom management, assessment practices, academic support and workplace components varying according to the age of students. Despite these differences, both the Review of Higher Education and the revised Australian Qualifications Framework (2010) propose *minimal* distinction between the level and types of qualifications delivered by HE and VET. The AQF has aligned VET and HE

Diploma qualifications, thus strengthening the divergence between *pre-Diploma* skills and knowledge that prepare students for employment (VET) and higher order skills and research-based knowledge contained in Diploma qualifications and above (HE).

Cross-sectoral pathways can contribute to regional access and participation in tertiary education by aligning the courses taught in one sector with those taught in another. Pathways built on curriculum alignment and cross-credit not only reduce the overall cost of education but also provide sequenced development of skills and knowledge to build confidence and success for disadvantaged students.

Findings and discussion

The Regional Pathways program has identified three types of educational pathway that enhance regional access to and participation in HE.

- *Vocational pathways* support progression between Certificate-level qualifications delivered by schools, TAFE and other registered training organizations (RTOs). Certificate courses are popular with young people from low to medium socioeconomic groups; for these students, interrupted transition to further study may restrict meaningful employment (Moodie, 2010). Recognised pathways ensure that a student who gains a Certificate II qualification in one sector can progress with full credit into a related Certificate III or IV course in another sector.
- *VET-HE pathways* between Certificate IV-Diploma qualifications and HE degrees provide opportunities to gain professional skills while offering exit points into semi-professional employment. The trend towards specification of fewer core subjects in national Training Packages raises the value of collaborative cross-sectoral arrangements that optimise credit and articulation between qualification levels.
- *Alternative pathways to HE* raise confidence and academic outcomes for disadvantaged people by linking educational experiences gained through school, vocational courses, employment and life. These pathways bring under-represented young and mature-aged people into education, providing both social and educational 'ladders of opportunity' to these groups (Wheelahan, 2009).
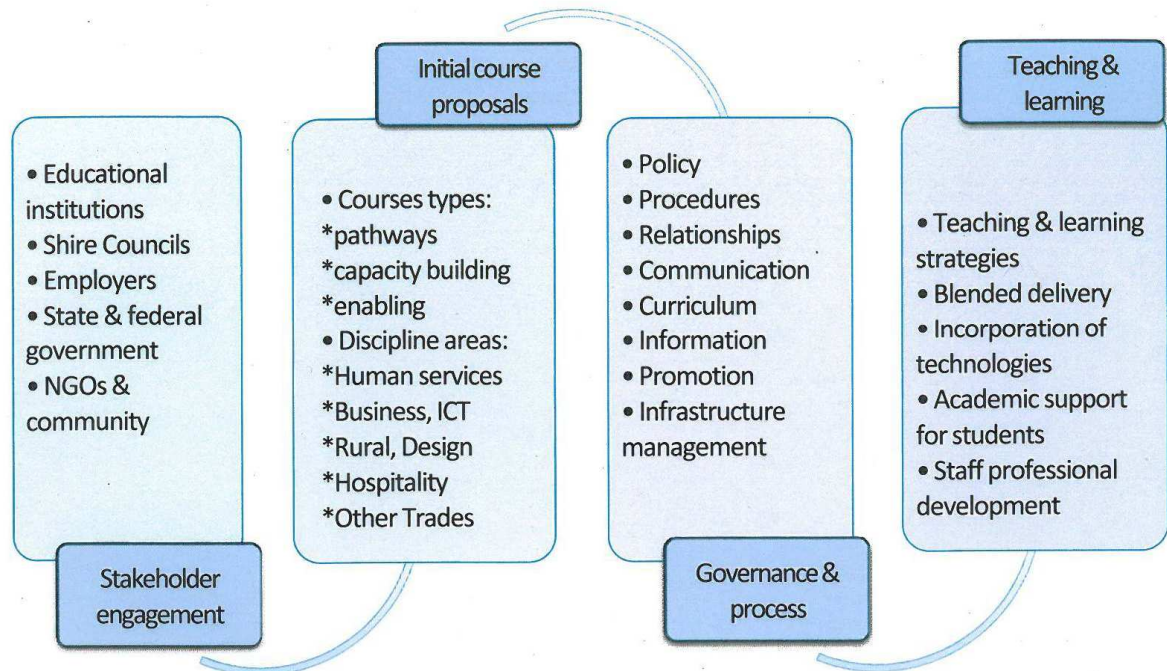
Structures and processes

Figure 1 illustrates a Framework for the design of regional pathways and courses. The Framework comprises four interconnecting components: stakeholder engagement, identification of initial course proposals, development of shared governance and delivery processes, and design of regional teaching and learning strategies.

Stakeholder engagement involves identifying and analysing the range of community views impacting on the program, including historical, political, economic, socio-cultural and performative perspectives. Local priorities are examined through research and statistics, government reports and community plans. More targeted stakeholder engagement is achieved through the identification of community 'leaders', who they collaborate with, the roles they play and the 'hot' issues they engage in. Typically, stakeholder groups include: (a) Shire Councils, including Social Planning and libraries; (b) TAFE Institutes, Department of Education & Training, local high schools and the VET in Schools program; (c) state and federal government agencies, including regional Premier & Cabinet offices, Industry & Infrastructure, partnership

brokers and the Indigenous Education Office; (d) employers, business councils, Aboriginal Elders, Regional Development Agencies (RDAs) and work-placement officers; and (e) non-government organisations (NGOs) and members of the public.

Figure 1. Framework for development of regional pathways and courses

Initial course proposals arise from priorities determined through community consultations. Public and private educational institutions then meet with government representatives to consider gaps and assess the feasibility of proposed courses and pathways, which should aim to optimise mutual benefit to educational providers, students, employers, community, government agencies and funding bodies.

Shared governance and processes manage the design and implementation of courses. A Memorandum of Understanding may be established, and decisions made on curriculum mapping, enrolment and fees, delivery options, resources and infrastructure including educational technologies, communication, roles and responsibilities and budgets. Advertising and promotion can occur through existing community networks, community radio and newspapers.

Teaching and learning approaches ensure that learning outcomes link directly to assessment tasks, work-based learning opportunities are included and blended and technology-enhanced delivery methods support student learning. Academic support is offered locally, especially for Indigenous students and learners with interrupted educational experience. Professional development for academics teaching across sectors or off-site is also provided.

Conclusions and outcomes

Regional communities have identified three suitable course types.
1. Community capacity building courses that respond to local needs expressed by Shire Councils, business and community agencies and recognise current competence

(RCC) gained through employment and community work. Courses fill gaps in skills and knowledge and provide qualifications or pathways to higher-level programs. Courses may also include culturally specific elements to optimise outcomes.

Case studies: community capacity building courses

Volunteering: Locally managed programs recognise Volunteering activities and provide additional training, thus providing credentials and enhancing the skills and abilities of the many community members who undertake voluntary work. This initiative is being extended to recognise and credential sports coaches and practitioners in a number of towns.

Training & Assessing: The Shire Council sponsors an initial program in which 12-20 people are trained in the Certificate IV in Training & Assessing. Participants agree to teach in the community following their training. This opens employment opportunities as well as providing credit towards a University Diploma.

Human Services-Aged Care: In one shire, Aged Care facilities managers are collaborating with three education sectors to alleviate a skills shortage in Human Services workers through school-based training and work-based learning pathways.

Community capacity building activities engage many people in education for the first time. Geographic isolation is reduced because students are taught in the region; fear of failure is eased through workplace sponsorship and learning support from local tutors; and flexible timetables are created to suit those with family responsibilities. Participants not only gain a qualification but also develop academic skills that enable them to continue their learning through TAFE or university. Most importantly, community capacity building activities have the potential to reverse intergenerational mind-sets against higher education and to unlock the potential of future generations.

2. Enabling courses that provide 'second chance' education to regional residents of all ages: those who have not completed school, have not achieved a tertiary entrance level or have not previously considered university study. Enabling courses build student confidence and provide a sympathetic environment for the development of skills in academic reading, critical thinking, numeracy, knowledge management and computer skills.

Case study: Enabling course

UCan Reach: This regional Enabling courses aims to overcome the lingering 'fear of school' reported by many adults with low educational attainment. Classes are held at a local community college, RTO or TAFE so that additional computer, literacy and numeracy training can be offered. Council librarians join the program and offer library tours and local knowledge management support. To reduce geographic isolation from the main campus, Enabling students become 'UC Students for a Day', meet other students through a Moodle site, access library E-reserve and make links with the university's Aboriginal student (Ngunnawal) centre.

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3. Courses designed to optimise pathways between sectors promote both sequential and consecutive learning programs. The Regional Pathways program has established 25 new *articulation and credit transfer arrangements* between UC and TAFE NSW to ensure that any TAFE NSW student who completes a Diploma in Accounting,

Building Design, Community Services, Agriculture, Conservation & Land Management, or Sport & Recreation can articulate into related UC courses with a specified amount of credit granted.

New cross-sectoral Diplomas in Business/Management, Community Development, Health Services (Aged Care – Allied Health) and Early Childhood Education have been mapped. Mapping is also extending 'backwards' to create pathways from school.

Case study: Joint delivery of Business/Management program across two Shires
Course/s: Diplomas in Business/Management with Tourism units (requested by community)
Length: Six months for underpinning Certificate IV + 1 year Diploma (full or part-time)
Location: Taught concurrently in both locations
Infrastructure and teaching/learning support: Flexible delivery at main TAFE campus and smaller annexe concurrently, supported with Moodle, video-conferencing, computer lab; professional development for teachers, academic and library support for students
Stakeholders: TAFE NSW, UC, Regional Interagency & community groups, Shire Councils, Chamber of Commerce/business groups, sports and tourism industries
Risks: Academic workload, cost of co-located delivery, dependence on current teaching staff, expectations of community
Opportunities: More locals employed on ski fields (replacing overseas workers); interest from another Shire Council to extend the program to include their residents
Promotion: Stakeholders, local newspapers, community radio, community newsletter.

Conclusion

The Regional Pathways program has been established to increase access, participation and attainment in HE for Indigenous, low socioeconomic status (SES) and regional equity groups in S-E NSW, through university-community and cross-sectoral education engagement.

This paper has addressed many of the negative perceptions that inhibit the development of cross-sectoral courses and pathways to enhance regional tertiary education provision. The paper demonstrates strategies for universities, other education providers and communities to promote access to university education through enabling courses, community capacity building programs and cross-sectoral pathways. A framework for managing stakeholder engagement, identifying initial course proposals, developing shared governance and delivery processes, and designing regional teaching and learning strategies is proposed. Case studies and outcomes from the Regional Pathways program can make a valuable contribution to national equity strategies, particularly those relating to regional Australia.

Acknowledgements

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