



Indigenous Cadetship Support Programs

A literature review

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Prepared by Inside Policy for the National Indigenous Australians Agency

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Introduction

This literature review has been developed to support the independent evaluation of the Indigenous Cadetship Support (ICS) and Tailored Employment Assistant Grants (TAEG) Cadetships programs. The purpose of this literature review is to better understand the characteristics, educational and employment outcomes (including trends) for Indigenous students in Australia and to draw on what is already known about similar kinds of programs, both domestically and internationally.

Research method

This literature review is a desk-based secondary analysis of existing and relevant research and evaluations. The literature reviewed been sourced from a range of online journals, research databases and other reports and relevant publications from reliable sources. The data collected has not been validated through interviews with project proponents, funders or service users.

Research scope

No specific inclusion or exclusion criteria was used for this literature review, rather a judgement was made by the researchers as to the quality and reliability of the literature and its relevance to the topic. Due to the general lack of research on the research topic, the literature reviewed includes:

- Cadetships, traineeships, apprenticeships, internships and graduate programs
- Programs targeting tertiary and vocational education students (but excluding secondary school students)
- Programs targeting Indigenous students, as well as 'mainstream programs'
- Programs targeting a range of sectors, including health, tourism and banking
- Programs operating in the public and private sectors

Research questions

The literature review serves to both set the context for the ICS/TAEG Cadetships evaluation and collect data relating to the agreed evaluation questions in the ICS Evaluation Strategy.¹ The specific questions the literature seeks to answer, and corresponding evaluation questions are:

- What does the data tell us about Indigenous education and employment outcomes in Australia (Contributes to evaluation question 2.1.2)?
- What other programs exist to support Indigenous participation in education, workforce participation and career development/progression (Contributes to evaluation question 3.2.2)?
- What evidence is there about the effectiveness of similar programs, both domestically and internationally? (contributes to evaluation question 3.2.5)
- What constitutes best practice in supporting Indigenous educational and employment outcomes domestically and internationally? (Contributes to evaluation question 2.4.5)

¹ ICS/TAEG Evaluation Strategy (2019). Available on request.

Limitations

A key limitation of the literature review is a lack of robust, independent and publicly available evaluations of Indigenous cadetships and like programs in Australia and internationally.

The policy context for support to Indigenous education and employment outcomes

This section describes the broader policy context for the Australian Government's support of Indigenous education and employment, including key changes in the broader socio-cultural and economic context since the Australian Government began supporting Indigenous cadetships two decades ago.

Commonwealth

The Australian Government has supported Indigenous Cadetships in some form since 1999, alongside a suite of other programs designed to improve Indigenous employment and education outcomes at different levels. The Indigenous Cadetship Support (ICS) program was previously delivered under the Indigenous Advancement Strategy (IAS) – Jobs Land and Economy Programme (JLEP) as a standalone program. The ICS program was designed to support Aboriginal and Torres Strait Islander tertiary students to complete their undergraduate degree and progress into ongoing employment. On 1 January 2018, the ICS program ceased and transitioned to the Tailored Assistance Employment Grants (TAEG). Other programs under the JLEP with similar aims include support to Vocation Training and Employment Centres (VTEC) and the Employment Parity Initiative (EPI).² Other key programs include the Indigenous Student Success Program (ISSP), which provides supplementary funding to universities to offer scholarships, tutorial assistance, mentoring, safe cultural spaces and other personal support services to Indigenous students. The flexibility of the ISSP assists universities to tailor their services to match student needs.

States and Territories

While the Commonwealth makes a significant financial contribution to education and provides national policy leadership, the states and territories are ultimately responsible for delivering school education and ensuring access to quality education within their jurisdictions. Providing strategic guidance to the cooperation between states, territories and the Commonwealth Government is the Closing the Gap Strategy, which was adopted by the Council of Australian Governments (COAG) in 2007. Among the high-level policy commitments included in Closing the Gap are to halve the gap in employment outcomes between Indigenous and non-Indigenous Australians within a decade (by 2018),³ with a focus on engagement with the mainstream economy.

² Clear Horizon (2017). Mapping the Indigenous Employment Programs. Department of Prime Minister and Cabinet. Provided

³ [Department of Prime Minister and Cabinet. \(2018\). Closing the Gap: Employment.](#)

Changes in the context and future trends

There have been a number of changes in the Australian context that have occurred since the Australian Government first began supporting Indigenous cadetships twenty years ago, which are likely to have influenced changes in Aboriginal employment and education outcomes. They include, but are not limited to:

Reconciliation Action Plans (RAP)

Reconciliation Australia was established in 2001 as the national expert body on reconciliation in Australia. One of key tools used by the Reconciliation Australia to mainstream reconciliation into institutions across sectors are Reconciliation Action Plans (RAPs). Reconciliation Australia launched its first RAPs in 2006 and to date over 1,000 organisations across a range of sectors, employing over 1.9 million Australians, have formalised their commitment to reconciliation through the development of a RAP.⁴ RAPs have been shown to have a positive influence on the attitudes of employees towards reconciliation between Indigenous and non-Australians.⁵ While the extent to which RAPs have increased the number of net employment opportunities (including cadetships, traineeships and apprenticeships etc.) for Indigenous people is less clear, an impact evaluation found that 92% of survey respondents who worked for RAP organisations agreed or strongly agreed with their employer providing opportunities for Indigenous people to extend their education through scholarship, traineeships and work placements.⁶ Furthermore, anecdotal evidence would suggest that setting targets and quotas for Indigenous staff and Indigenous businesses in supply chains are common goals for RAPs, which is likely to have increased the employment opportunities available to Indigenous Australians.

Philanthropy and Corporate Social Responsibility

The past two decades have seen an increasing expectation that the private sector join the government and not-for-profit sectors in improving employment and education outcomes for Indigenous people, particularly in the mining and resources sector. The most notable example, and perhaps a tipping point for a broader shift in consciousness was Andrew Forrest of Fortescue Metals Group (FMG) who in 2008 launched the Australian Employment Covenant with a bold goal of placing 50,000 Indigenous Australians into jobs within two years.⁷ Mr Forrest was later appointed by Prime Minister Tony Abbott to Chair the Review of Indigenous Training and Employment Programmes, which made wide-ranging recommendations that went beyond training and employment and included income management, early childhood services, school attendance, housing and mobility.⁸

⁴ [Reconciliation Australia \(2019\) Reconciliation Australia Annual Review 2018-2019.](#)

⁵ Auspol. (2012). [Evaluating the effectiveness of Reconciliation Action Plans.](#) Reconciliation Australia.

⁶ Ibid.

⁷ Department of Education, Employment and Workplace Relations 2008, *Fact Sheet – The Australian Employment Covenant*, Commonwealth of Australia, Canberra.

⁸ Jordan, K (2014). [Andrew Forrest's Indigenous employment project: Do the arguments stack up?](#) Australian Review of Public Affairs.

Automation

36% of Australian jobs face a significant or high risk of automation.⁹ According to current predictions, Indigenous Australians will be more vulnerable to job losses because they tend to work in jobs facing the highest risk of job loss, such as food and beverage services, retail, and construction.¹⁰ OECD research demonstrates that the jobs most likely to be automated are within occupations that generally require lower levels of skills. For example, the Australian government projects that jobs requiring a bachelor's degree or higher qualification will see the strongest growth of 10% between 2018-2023, while jobs requiring a Certificate II or III qualification are projected to grow by only 7% or 250 000. As previously outlined in this report, Indigenous Australians are more likely than non-Indigenous Australians to be studying a lower qualification, therefore more needs to be done to equip Indigenous Australians with the right skills in the future labour market.

Findings

Tertiary education and graduate employment outcomes for Indigenous Australians

This section briefly reviews the latest data on tertiary education and graduate employment outcomes for Indigenous Australians. Due to the large amount and complex nature of the data available for analysis, the scope of this section is limited to university education and vocational education and training (VET) as they are the sectors where cadetships and similar programs are more commonly implemented. This section also identifies key enablers and barriers to enrolling and completing tertiary education.

University education and graduate outcomes

It is well established that improving higher education outcomes among Indigenous Australians will contribute to nation building and reduce Indigenous disadvantage,¹¹ however despite a plethora of initiatives over recent years to address their under-representation, Indigenous students' participation in higher education remains below the population parity rate and that of non-Indigenous Australians. However, there are some positive trends: University enrolments for Indigenous undergraduate students have more than doubled (113%) in the past decade.¹² This contributed to an overall increased share of Indigenous university enrolments (all-levels) from 1.3% to 1.8% in the same period,¹³ although it is below the 3.1% population parity estimated by the Australian Bureau of Statistics (ABS).¹⁴ To achieve population parity, the annual growth in Indigenous student enrolments will need to significantly exceed that of non-Indigenous students.

⁹ OECD (2019), [Indigenous Employment and Skills Strategies in Australia. Policy Highlights.](#)

¹⁰ Ibid.

¹¹ Behrendt et. al. (2012). [Review of Higher Education Access and Outcomes for Aboriginal and Torres Strait Islander People Final Report.](#)

¹² Australian Government Department of Education and Training (2018) Selected Higher Education Statistics – 2017 Student Data cited in Universities Australia (2019) [Universities Australia Indigenous Strategy First Annual Report.](#)

¹³ Ibid.

¹⁴ Australian Bureau of Statistics (ABS) 2018, [Estimates of Aboriginal and Torres Strait Islander Australians, June 2016](#), Cat. No. 3238.0.55.001.

Since 2015, the annual growth in Indigenous university enrolments has almost tripled that of non-Indigenous students, although this has been in part enabled by a steady decline in university enrolments among non-Indigenous students.¹⁵ Indigenous applicants for undergraduate courses are more likely to be older and female than non-Indigenous applicants. In 2018, one-third of Indigenous applicants were aged 25 or older, compared to 22 per cent of non-Indigenous applicants and 68% were female compared to 59% of non-Indigenous applicants.¹⁶

There are also trends evident in the types of courses that Indigenous students are more likely to enrol in. For example, Indigenous students are more likely than non-Indigenous students to study undergraduate courses related to Society and Culture (33% of all Indigenous enrolments), Health (22% of all Indigenous enrolments) and Education (14% of all Indigenous enrolments) and less likely to enrol in Management and Commerce (10% of all Indigenous enrolments), Natural and Physical Sciences (6% of all Indigenous enrolments) and Engineering (3% of all Indigenous enrolments).¹⁷

Despite strong year-on-year growth over the past decade (consistent with the growth in Indigenous student enrolments), Indigenous undergraduate award course completions remain poor compared to non-Indigenous students. For example, while Indigenous students typically can take longer to graduate, nine-year completion rates for Indigenous students are around 47% compared to 74% for non-Indigenous students,¹⁸ with similar gaps at 4- and 6-year completion rates.¹⁹ On a positive note, the proportion of commencing Indigenous Bachelor degree students that did not ever return after the first year of study has declined since 2005 from 20% to 16% for the Indigenous student cohort that started in 2009.²⁰

Once Indigenous Australians navigate the immense challenges of completing secondary school, and enrolling and completing a university degree, they generally experience strong employment outcomes. In 2018, four months after completion of an undergraduate degree, Indigenous and non-Indigenous graduates were equally likely (72.9%) to be in full-time employment and experienced an almost identical labour force participation rate.²¹ Employed Indigenous graduates were also less likely than non-Indigenous graduates to report that their skills or education were not being fully utilised (30.4% compared to 39%).²²

¹⁵ Australian Government Department of Education and Training (2018) Selected Higher Education Statistics – 2017 Student Data cited in Universities Australia (2019) [Universities Australia Indigenous Strategy First Annual Report](#).

¹⁶ DET (2018) Undergraduate Applications Offers and Acceptances, unpublished data cited in Universities Australia (2019) [Universities Australia Indigenous Strategy First Annual Report](#).

¹⁷ DET 2018, Unpublished HEIMS data cited in Universities Australia (2019) Universities Australia Indigenous Strategy First Annual Report, page 14.

¹⁸ DET 2018, *Completion Rates of Higher Education Students – Cohort Analysis, 2005–2017* cited in Universities Australia (2019) Universities Australia Indigenous Strategy First Annual Report, page 17.

¹⁹ Ibid.

²⁰ DET 2018, *Completion Rates of Higher Education Students – Cohort Analysis, 2005–2017* cited in Universities Australia (2019) Universities Australia Indigenous Strategy First Annual Report, page 17.

²¹ Australian Government Department of Education and Training (2019). [2018 Graduate Outcomes Survey National Report](#).

²² Ibid.

In 2018, Indigenous undergraduates continued to earn more than non-Indigenous undergraduates immediately upon graduation, with median salaries of \$65,600 and \$61,000 respectively,²³ however longitudinal data shows that this salary gap narrows three years after completion,²⁴ which is likely because the courses and professions that Indigenous students are more likely to pursue (e.g. teaching and health) are also likely to be paid less. This demonstrates the need to support Indigenous students to enter a more diverse range of sectors, especially business and the private sector.

Vocational Education and Training (VET) and employment outcomes

The enrolment of Aboriginal and Torres Strait Islander students in VET is higher than in university, although there are variations in this pattern in the states and territories, especially those with a dominant mining sector. That said, it should be noted that VET is not a strong pathway for students into university, with 4.9 per cent of Aboriginal and Torres Strait Islander students making the transition in 2012, compared to 7.9 per cent for non-Indigenous students.²⁵ Indigenous Australians are also more likely to be enrolled in VET than non-Indigenous Australians, for example 18.7% of the Indigenous adult population were enrolled in VET in 2015, compared with 9.3% of non-Indigenous adult population.²⁶ Similarly, Indigenous people are more likely to be participating in apprenticeships and traineeships than non-Indigenous people, albeit at a lower level.²⁷ Indigenous participation in VET has shifted away from lower-level qualifications (Certificates I and II) towards higher-level qualifications (Certificate III and above), however Indigenous people are still over-represented in lower-level qualifications, especially in remote and very remote areas.²⁸

Program completion rates for Indigenous VET students have increased slightly since 2010, but Indigenous VET students remain 13% less likely to complete their course than non-Indigenous VET students.²⁹ Completion rates for the Indigenous population are considerably lower for very remote areas and lower-level qualifications.³⁰ Completion rates for Indigenous apprentices and trainees are lower than for non-Indigenous apprentices and trainees, and lower for non-trade qualifications (for both Indigenous and non-Indigenous students).³¹

Unlike Indigenous university graduates, Indigenous VET graduates are less likely than their non-Indigenous counterparts to be employed before and after completing their course. In 2016, 67.5% of Indigenous VET graduates found employment after course completion, compared to 75.1% of non-Indigenous graduates.

²³ Ibid.

²⁴ Australian Government Department of Education and Training (2019). [2018 Graduate Outcomes Survey – Longitudinal \(GOS-L\) Medium-term graduate outcomes](#).

²⁵ Wilks, J & Wilson, K (2015) A profile of the Aboriginal and Torres Strait Islander higher education student population. [Australian Universities' Review vol. 57, no. 2](#), pp. 178-30.

²⁶ Windley, G (2017). [Indigenous VET participation, completion and outcomes: change over the past decade](#). National Centre for Vocational Education Research.

²⁷ Ibid.

²⁸ Ibid.

²⁹ Ibid.

³⁰ Ibid.

³¹ Ibid.

However, once these figures are adjusted to take into account those who were *already* employed before studying, the gap is much smaller. For example in 2015-2016, 40.7% of Indigenous graduates and 42.5% of non-Indigenous graduates who were not employed before studying, were employed after completing their course.³²

Among the non-trade qualifications, Indigenous VET students studying health and education are most likely to find employment at the conclusion of their course.³³ Despite Indigenous apprentices having the lowest completion rates of all VET students, they are more likely to be employed after training than their non-Indigenous counterparts and Indigenous people undertaking non-trade training.³⁴ Contrary to popular perception, Indigenous graduates from remote and very remote areas are more likely to be employed after training than graduates from other areas.³⁵

Barriers and enablers to enrolling in and completing tertiary education

The literature highlights a number of key barriers and enablers that affect enrolment and completion of tertiary education.

In their research exploring the enrolment and retention of Indigenous law students, Hobbs and Williams (2019) suggest that a range of interlinked factors may negatively affect Indigenous students' entry into and completion of their studies, including feelings of isolation and alienation; overt and covert racism by university staff and fellow students; financial hardship and competing demands of work and study.³⁶

Venn and Crawford's 2016 census paper on post-school education in Australia highlights that there is a myriad of reasons why Indigenous young people are less likely to attend university than non-Indigenous young people. These include

- the relatively high proportion of Indigenous people living in remote and regional areas where education options are fewer (which affects university participation much more than vocational participation),
- low average household income,
- low levels of parental education,
- large numbers with caring responsibilities, and
- lower rates of year 12 completion.³⁷

A study of Maori graduates (N=626) from eight New Zealand Universities that set out to understand the factors that were helpful or challenging to completing their qualifications found that helpful factors included:³⁸

³² Ibid.

³³ Ibid.

³⁴ Ibid.

³⁵ Ibid.

³⁶ Hobbs, H & Williams, G (2019). The Participation of Indigenous Australians in Legal Education 2001-2018. NSW Law Journal Vol 42(4), pp. 1294-1327.

³⁷ Venn D and Crawford H (2018), Postschool education, 2016 Census Paper no. 11, Centre for Aboriginal Economic Policy Research, Australian National University, Canberra.

³⁸ Theodore, R., Gollop, M., Tustin, K., Taylor, N., Kiro, C., Taumoepeau, M., Kokaua, J., Hunter, J. and Poulton, R., 2017. Māori University success: what helps and hinders qualification completion. *AlterNative: An International Journal of Indigenous Peoples*, 13(2), pp.122-130.

- Relationships, between students and staff, students and the institution and between students
- Family support, and encouragement for extended family to support their family members who are studying (e.g. through orientations, parent receptions and contact with academic advisers and support staff)
- Support from the university to maintain strong tribal identities and community relationships, allowing participants to work towards their aspirations to provide a better life for their families and contribute to tribal development,
- Provision of sufficient financial support to assist with the cost of living and studying
- Maori support services, programmes and networks and student associations, as these promote community connectedness, reduce cultural alienation, provide peer support and enhance belonging
- Personal factors, including determination, perseverance and being goal-oriented
- Culturally appropriate and responsive policies, strategies and curricula

Factors that were identified as challenges to completing their qualifications included:

- Family responsibilities, for some participants resulting in them undertaking part-time study or taking longer to complete their qualifications
- Balancing multiple obligations including parenting, study and work
- Underrepresentation of Maori staff and role models and the lack of culturally competent support and supervision
- Eurocentric environments and the lack of integration of Maori concepts and knowledge³⁹

Ottman (2017) also identifies financial resources, absence of role models who have post-secondary education experience and lack of understanding of Aboriginal culture on campus as barriers to completion of tertiary qualifications for Aboriginal people in Canada and adds the barrier of racism.⁴⁰ Ottman notes that Canadian universities are increasingly working to become more integrative and respectful of Indigenous people, their histories, knowledge and pedagogies and practices and this is contributing to cultural change in institutions that should positively influence educational attainment for Indigenous students.⁴¹

What works to improve the transition from education to employment for Indigenous Australians?

This section seeks to answer the question: What works to support Indigenous education and employment outcomes? It does this by reviewing programs that seek to support Indigenous education and employment outcomes in Australia and abroad, specifically by supporting students to transition from school or university into to employment through cadetships, apprenticeships, internships, traineeships and graduate programs (referred to collectively in this review as 'study to employment transition [SET] programs' for ease of reference).

³⁹ Ibid

⁴⁰ Ottmann J. (2017) Canada's Indigenous Peoples' Access to Post-secondary Education: The Spirit of the 'New Buffalo'. In: Frawley J., Larkin S., Smith J. (eds) *Indigenous Pathways, Transitions and Participation in Higher Education*. Springer, Singapore

⁴¹ Ibid

This section focuses on SET programs targeting university students, however examples from programs targeting senior secondary and VET students are also included where there are relevant learnings for tertiary education. While the scope of the literature review initially included examples from countries outside Australia (namely USA, Canada and New Zealand), and despite of plethora of programs being identified, very few evaluations of relevant programs could be located. Therefore, this section primarily draws on examples of SET programs from Australia. It concludes by summarising key insights from the review and capturing learnings for current and future support to Indigenous cadetship programs.

SET programs have been used in a range of sectors in Australia and abroad, most notably in health and government, and increasingly in the private sector. The objective of most of these programs is to improve the educational and employment outcomes of Indigenous people more broadly, however some programs include a 'return of service' component and have secondary objective of filling gaps in skills shortages, particularly in rural and remote areas.⁴² SET programs are targeted at current or prospective students and generally combine study and training by facilitating their participation in one or more work placements with the objective of obtaining employment skills and in most cases, securing ongoing employment at the completion of their studies. The eligibility criteria, length of the work placement, payment arrangements and additional support provided to cadets varies between programs. While these programs are widely supported by governments at different levels in partnership with a range of employers, outcomes-focused evaluations are few are far between and as a result, there is little evidence of their effectiveness or impact. This is consistent with the overall lack of evidence about what works to improve outcomes for Indigenous populations more broadly.^{43 44 45}

Methodologies for evaluations of SET programs

When searching for evaluations to include in the literature review, we found none that used a control or comparison group, articulated a clear and measurable theory of change or compared participant outcomes at baseline and end line.⁴⁶ The evaluations included in the review use a retrospective, post-test only design, which is generally considered to be the weakest form of evaluation design.⁴⁷

⁴² Lewis, MJ., Ellis, R., SK Adusumilli, SK., Cameron I (2016). [Twenty-five years on: outcomes of a longitudinal evaluation of the NSW Rural Resident Medical Officer Cadetship Program](#). Rural and Remote Health 16: 3846.

⁴³ Smith et. al. (2017). [Viewpoint: What do we know about evaluation in Indigenous higher education contexts in Australia? International Studies in Widening Participation, Vol. 4, Iss. 2, pp. 18-3.](#)

⁴⁴ Muir S & Dean A 2017, [Evaluating the outcomes of programs for Indigenous families and communities. Child Family Community Australia \(CFCA\) Practitioner Resource— February 2017. Australian Institute of Family Studies.](#)

⁴⁵ Behrendt, L., Larkin, S., Griew, R., & Kelly, P. (2012). Review of Higher Education Access and Outcomes for Aboriginal and Torres Strait Islander People: Final Report. Canberra: Australian Government.

⁴⁶ A small number of evaluations used a comparison group but only included a comparison of administrative data and did not collect primary qualitative data from participants.

⁴⁷ We note that what is considered high-quality research by dominant Western evaluation frameworks is not always consistent with the Indigenous perspective, approach and methods for evaluation. That said, none of the evaluations reviewed in this literature review clearly articulated the intention of using an Indigenous evaluation approach, and therefore are considered to be neither rigorous nor culturally appropriate in their design.

The literature highlights the broader problem of the current lack of sophisticated evaluation models that both comprehensively measures outcomes and incorporate Indigenous knowledge and systems into Indigenous higher education contexts. As Frawley, Smith and Larkin explain:

One key challenge we face in Australia is to move beyond basic process and impact evaluation approaches about Indigenous higher education pathways and transitions. We need to develop more sophisticated evaluation models that reflect more rigorous, comprehensive and nuanced understandings of what Indigenous higher education trajectories look like, the inherent complexities they bring, how they can best be navigated, and the tangible outcomes Indigenous specific programs can achieve. This includes the capacity to examine and monitor new and innovative institutional and organisational culture change to reform Indigenous education within higher education settings ... emerging evaluation approaches that build on Indigenous knowledge systems could be useful in this regard. These will need to privilege Indigenous epistemologies, ontologies and axiologies.⁴⁸

A report on strengthening evaluation in Indigenous higher education contexts argues that further commentary and the privileging of Indigenous standpoints through evaluation in Indigenous higher education contexts will enhance evaluation effectiveness, and produce better quality, and more comprehensive, data to inform policy, program, and system improvements.⁴⁹ This report also proposed a conceptual model of potential performance parameters to strengthen Indigenous higher education monitoring and evaluation in Australia which is a useful starting point for the future design of methodologies for evaluation of SET programs.⁵⁰

Despite the limitations of existing methodologies for evaluations of SET programs, the evaluated programs revealed some insights on the impact of SET programs on employment outcomes and the key enabling factors that contributed to the effectiveness of the program.

The impact of SET programs on Indigenous employment outcomes

The extent to which SET programs contribute to greater levels of employment among participants can be difficult to measure, especially given the fact that many programs have a small sample size. One larger evaluation of multiple Indigenous traineeships, cadetships and graduate program placements in the health workforce between 2010-2015 (found that the employment status of program participants at completion and ex-post was not routinely collected, making it difficult to ascertain the impact of the program on employment outcomes and career progression.⁵¹

⁴⁸ Frawley, J., Smith, J. & Larkin, S. (2015). Beyond Bradley and Behrendt: Building a stronger evidence-base about Indigenous pathways and transitions into higher education. *Learning Communities: International Journal of Learning in Social Contexts*. Number 17, 8-11.

⁴⁹ Smith, J., Pollard, K., Robertson, K. & Shalley, F. (2018). *Strengthening evaluation in Indigenous higher education contexts in Australia: 2017 Equity Fellowship Report*. Perth: National Centre for Student Equity in Higher Education.

⁵⁰ Ibid

⁵¹ DHHS. (2016). *Evaluation of Traineeships for Aboriginal workforce development in Victoria. Final Report*. Australian Healthcare Associates: Melbourne. Available at: <https://www2.health.vic.gov.au/Api/downloadmedia/%7BAA5BF304-C145-4BA1-952E-8A1E67CD5381%7D> [Accessed 05/11/19]

A 'deep dive' in one region where the program was implemented found that of those who participated in the programs (79 in total), 88% of those who completed the program were employed in the health workplace at the time of evaluation compared to only 50% of those who withdrew from the program prior to completion.⁵² An independent evaluation of the Te Puni Kōkiri Cadetships initiative in New Zealand, which aimed to support public service employers to develop, mentor, train and grow full-time permanent Māori staff to take on more senior roles within an organisation, found that employer-supported cadets have increased their employability and are gaining access to the labour market, entering into growth industries and skilled occupations, and permanent employment.⁵³ However the evaluation referred to was not publicly available and the methodology and results could not be further verified.

Evidence from SET programs in the vocational education sector also suggests that students who participate in an apprenticeship or traineeship are more likely to gain employment at the completion of their study than those who don't. For example, an analysis of administrative data from the Australian Student Outcomes Survey collected in the first quarter of 2013 shows that among Indigenous vocational education students who were not employed at the commencement of their study, 52.1% of those who participated in an apprenticeship or traineeship alongside their study were able to find work after they finished their course, compared to 31.6% of Indigenous students who did not participate in an apprenticeship or traineeship.⁵⁴ Another study, which analysed data from the Longitudinal Survey of Australian Youth, assigned individuals into 3 different groups, those who entered apprenticeship programs, those who entered traineeship programs, and those who had not entered either of the programs (non-participants). Controlling for a range of family characteristics and individual attributes, the study suggested that six years after completion, employment rates for apprentices were about 5.2 percentage points higher than for the non-participants.⁵⁵ The apprentices and the trainees also had higher earnings than non-participants three years after the training started.⁵⁶ A 2007 evaluation of the Skilling Queenslanders for Work (SQW) program, which assisted jobseekers into employment through traineeships, used conditional probability modelling to compare the likelihood of gaining employment for persons of similar circumstances, conditional on whether or not the person participated in the program. The findings suggest that almost 15% of those who found employment through the SQW program would not been able to find employment if they had not participated in the programs (although the results were not specific to Indigenous participants).⁵⁷

⁵² Ibid.

⁵³ [tpk-case-study-dec13](#)

⁵⁴ Biddle, N., Brennan, C., Yap, M. (2014). [Effectiveness of traineeships and apprenticeships for the Aboriginal and Torres Strait Islander population. Australian Institute of Family Studies Resource sheet no. 31 produced for the Closing the Gap Clearinghouse.](#)

⁵⁵ Fok and Tseng (2009) in Biddle, N., Brennan, C., Yap, M. (2014).

⁵⁶ Ibid.

⁵⁷ Deloitte Access Economics (2012) in Biddle, N., Brennan, C., Yap, M. (2014).

Finally, two studies reviewed from the USA also found that those who participate in apprenticeship programs enjoy improved employment outcomes and higher earning capacity, although the programs were not targeted to Indigenous students and outcomes were not disaggregated by ethnicity.^{58 59}

A more comprehensive evaluation of employment outcomes for those who participate in SET programs should consider more than simply whether program participants gained employment on completion of the program and include outcomes such as job satisfaction, career progression and earning capacity. The research and evaluations reviewed provide little evidence to support employment outcomes beyond employment itself. One exception was the evaluation of the Skilling Queenslanders for Work (SQW) program which found that the program had positive impacts on participant health and wellbeing, life satisfaction and improved support networks.⁶⁰ Data from the Australian Student Outcomes Survey also found that 26.7% of Indigenous respondents who trained as part of an apprenticeship or traineeship reported that they improved their skill level, substantially higher than the 12.6% of Indigenous students who participated in study alone,⁶¹ however the extent to which this influenced career progression and earning capacity requires further investigation.

In conclusion, while more and better-quality research and evaluation is required, it is reasonable to suggest that SET programs have a positive impact on the employment status of vocational education students, however there is comparatively less information available on SET programs targeting tertiary students. This is particularly important considering that the rates of employment for Indigenous university graduates are already very high, and Indigenous graduates routinely outperform non-Indigenous graduates in terms of employment outcomes (although the percentage of Indigenous students who complete their undergraduate degree remains significantly lower than non-Indigenous students).⁶² The next part of this section examines what the evidence reviewed tells us about the components of SET programs that increase program effectiveness and in some cases participant employment outcomes.

Characteristics of effective SET programs

Evaluated programs reviewed as part of the literature review identified several factors that participants and employers believed influenced the effectiveness of the program. It should be noted that the weak nature of the evaluation designs means that these factors cannot be directly attributed to increased employment outcomes of participants, however the fact that they were salient across multiple programs adds strength to their claim.

⁵⁸ Reed D, Liu A, Kleinman R, Mastri A, Reed D, Sattar S et al. 2012. An effectiveness assessment and cost-benefit analysis of registered apprenticeship in 10 states. Washington, DC: Employment and Training Administration, United States Department of Labor. Viewed 14 April 2014

⁵⁹ Hirsch BJ, Hedges LV, Stawicki J & Mekinda MA (2011) in Biddle, N., Brennan, C., Yap, M. (2014).

⁶⁰ Deloitte Access Economics (2012) in Biddle, N., Brennan, C., Yap, M. (2014).

⁶¹ Ibid.

⁶² Universities Australia (2018). [Universities Australia Indigenous Strategy First Annual Report](#).

Mentorship

An evaluation of Indigenous traineeships, cadetships and graduate programs in the Victorian health workforce over a five-year period found that mentoring by a trained, culturally aware mentor was identified as an important support for program participants.⁶³ An evaluation of an Indigenous traineeship program by Tourism Tropical North Queensland (TTNQ) also found that the role of Indigenous mentors were critical to the success of the program.⁶⁴ This is supported by a multi-variate analysis of administrative data from Queensland Department of Education, Training and Employment which found that Indigenous apprentices who received support from a cultural mentor were significantly more likely to complete their apprenticeship than those who didn't (although the impact of mentorship on employment outcomes was not within the scope of the study).⁶⁵ An evaluation of a mentoring program designed to increase completion rates of Aboriginal apprentices and trainees found that participants had lower cancellation rates (including cancellations, withdrawals, dismissals and suspensions) than other Aboriginal apprentices and new entrant trainees.⁶⁶ Again, the impact of mentorship on employment outcomes was not within the scope of the program or the evaluation.

The programs reviewed used different models of mentorship. In some, an Indigenous person was employed by the program on a full-time basis to support participants, while in other programs, participants reported receiving support from a variety of Indigenous and non-Indigenous mentors, both formally (as a structured part of the program) and informally (i.e. self-identified). Across all programs, mentorship appeared to be most effective when it was performed by someone who was either Indigenous or who demonstrated a high level of cultural competence, and who provided support to both the program participants and their employers.

Peer Support

An evaluation of Indigenous traineeships, cadetships and graduate programs in the Victorian health workforce found that peer support was seen an important factor, by both trainees and organisational representatives, in helping trainees avoid feeling isolated and in providing mutual support during the program.⁶⁷ Organisational representatives' views differed on the best method for ensuring peer support (e.g. by hosting more than one participant or by linking participants with others in the organisation) however the evaluation found that the number of program participants hosted by an employer had no effect on program completion rates.⁶⁸

⁶³ DHHS. (2016). Evaluation of Traineeships for Aboriginal workforce development in Victoria. Final Report. Australian Healthcare Associates: Melbourne. Available at: <https://www2.health.vic.gov.au/Api/downloadmedia/%7BAA5BF304-C145-4BA1-952E-8A1E67CD5381%7D> [Accessed 05/11/19]

⁶⁴ Australian Government Department of Resources, Energy & Tourism (2012). [Tourism Tropical North QLD Indigenous Employment Program. Final Report.](#)

⁶⁵ Trendle B (2013). The effect of a mentoring program on Indigenous apprenticeship completion in Queensland. Paper presented at the 22nd National Vocational Education and Training Research conference 'No frills', Mooloolaba, Queensland, 10–12 July.

⁶⁶ Powers, T (2011). ['The Way Ahead'—mentoring of Aboriginal apprentices & trainees: follow up & assessment. Prepared for NSW Board of Vocational Education and Training & State Training Services, Department of Education and Training, New South Wales. Sydney.](#)

⁶⁷ DHHS. (2016). [Evaluation of Traineeships for Aboriginal workforce development in Victoria. Final Report. Australian Healthcare Associates: Melbourne.](#)

⁶⁸ Ibid.

While the overall sample size was much smaller (n=31) the evaluation of the Tourism Tropical North Queensland Indigenous Employment Program found that trainees who had a 'buddy' at work (which was usually their direct supervisor or a peer), seemed to overcome the challenges more easily than those who did not relate to their work colleagues as readily.⁶⁹

While peer support is slightly more difficult than formal mentorship to embed in the design of SET programs, the Congress of Aboriginal and Torres Strait Islander Nurses and Midwives (CATSINaM) recommends that in addition to providing cultural mentors, employers participating in Cadetship and Transition to Professional Practice (TPP) Programs for Indigenous nursing and midwifery students should ensure that program participants have access to cultural peer support within the organisation (e.g. by connecting cadets with other Indigenous staff or staff associations and forums) as well as outside the organisation (e.g. by connecting cadets with existing Indigenous professional associations and forums in the area or sector they are working in). A small case study of 18 participants of the National Australia Bank (NAB) Indigenous Employment Program (IEP) who have transitioned into employment with the organisation found that only two participants (11%) were members of formal networks outside NAB and benefitted from that involvement and that there was interest among the Indigenous employees interviewed for an Indigenous employee network within NAB which could be maintained by teleconferences, online forums and email contact.⁷⁰

Matched/Targeted Participant Selection

Several program evaluations reviewed found that participant recruitment processes that are not appropriate and targeted can result in high dropout rates and failure to transition into permanent employment. For example, a tourism traineeship program for Indigenous jobseekers in Far North Queensland found that the program would have been more effective if trainees were matched to roles that they were capable and motivated to perform.⁷¹ Alternatively, programs that allowed participants to rotate among different organisations or departments during the program showed promising results as they gave participants the opportunity to demonstrate their ability and develop an interest in an area of work.⁷²

Meaningful opportunities for ongoing employment

An evaluation of traineeship, cadetship and graduate employment programs in the Victorian health workforce between 2010-2015 found that participant recruitment and retention was more successful when it was focused on providing work placements in areas of industry need, rather than to traineeship positions that are unlikely to result in a job.⁷³

⁶⁹ Australian Government Department of Resources, Energy & Tourism (2012). [Tourism Tropical North QLD Indigenous Employment Program. Final Report.](#)

⁷⁰ Daly, A & Gebremedhin, T (2013). [Can an "Indigenous Employment Program" work? A case study of National Australia Bank. University of Canberra.](#)

⁷¹ Australian Government Department of Resources, Energy & Tourism (2012). [Tourism Tropical North QLD Indigenous Employment Program. Final Report.](#)

⁷² DHHS. (2016). Evaluation of Traineeships for Aboriginal workforce development in Victoria. Final Report. Australian Healthcare Associates: Melbourne. Page 16.

⁷³ Ibid, page 19

This was particularly important in regional areas where jobs may not be available in some disciplines and turnover rates are very low. In some cases, the ability of employers to retain program participants was constrained by lack of resources, however in other cases it was implied that some employers were training Indigenous people for non-existent jobs, which risked damaging Aboriginal community confidence in the program and potentially the host organisation. One ACCO interviewed reported that the organisation only participated in hosting program participants if they expected to have a job for trainees on completion. This decision was based on their view that training a person and not giving them ongoing work was unacceptable for the organisation, the trainee and the community.⁷⁴ This extent to which mainstream service providers shared this sentiment was unclear. Elsewhere, accusations of employers exploiting Indigenous trainees as ‘cheap labour’ without legitimate opportunities for post-placement employment has received negative backlash in the media.⁷⁵

Key insights

The literature review revealed the following key insights that may be relevant to the Australian Government’s future support to Indigenous Cadetship programs:

- Apprenticeships and traineeships in VET have been proven to improve employment outcomes for Indigenous students, but it remains an underutilised pathway into university education.
- Little is known about the socio-economic status of Indigenous cadets and the extent to which cadetships are reaching the most marginalised and disadvantaged students.
- While Indigenous graduates outperform their non-Indigenous counterparts in terms of graduate salaries, there is some evidence to suggest this gap closes over time, which may be a result of Indigenous students pursuing careers in less lucrative industries. There is scope for cadetships to be used to support Indigenous graduates to progress into more senior positions in their chosen field.
- Key barriers affecting enrolment and completion of tertiary education for Indigenous students include, feelings of isolation and alienation, racism, financial hardship, location, caring and family responsibilities, low levels of parental education and lack of understanding and integration of Indigenous cultures in tertiary education environments
- Key enablers of enrolment and completion of tertiary education include integrating and respecting Indigenous knowledge, culture and practice into tertiary institutions policies, strategies and curricula, relationships between students, staff and institutions, family support, financial support and Indigenous specific support services, programmes and networks.

⁷⁴ DHHS. (2016). Evaluation of Traineeships for Aboriginal workforce development in Victoria. Final Report. Australian Healthcare Associates: Melbourne. Page 16.

⁷⁵ [article - qantas-denies-exploiting-indigenous-workers-through-traineeship-program](#)

- The design and scale of effective cadetship and like programs is hampered by a lack of evidence about what works. Filling this gap in evidence will require programs to improve the collection of data, especially on post-placement employment outcomes, and more robust evaluation designs that begin at the start of the program cycle.
- There is consensus on the important role that mentoring and peer support plays in enhancing the wellbeing and cultural safety of SET program participants.
- Cadetship programs that use targeted recruitment to match participants to roles they are genuinely interested in appear to be more successful than those that don't.
- Cadetship programs that are not linked to meaningful employment opportunities risk negative backlash and may be perceived by participants as tokenistic and exploitative.
- Little is known about the financial incentives provided by cadetship programs and the extent to which they influence program completion and employment outcomes.
- Future support to Indigenous Cadetship Programs should consider the changes in the external context, which among other things has seen a greater accountability among private sector companies to drive Indigenous employment outcomes, especially in the mining and resources sector.