

Universities Australia Submission to the Engagement and Impact Assessment Consultation Paper

June 2016

Universities Australia (UA) welcomes the opportunity to respond to the consultation paper on the development of a national assessment system to measure industry engagement and non-academic impact of university research.

Governments, universities and businesses have identified Australia's low levels of collaboration between industry and university researchers as a major barrier to Australia's successful transition to an innovation nation. The national assessment for university research engagement and impact is an important initiative for encouraging universities to better engage with business and other end-users including small and medium-sized enterprises (SMEs), the not-for-profit sector, governments and community organisations.

A number of research and translation activities undertaken by universities are not fully captured in Excellence in Research for Australia (ERA) and other measures of research output and quality. A parallel exercise to ERA is a welcome recognition of the wider role and contribution that universities make outside of the immediate academic milieu. Notwithstanding the significance of this exercise, it is of upmost importance that the value of basic research as an essential part of the research and innovation system, is acknowledged and retained.

The task of assessing engagement and impact is worthwhile, if complex and difficult. The key challenges are well captured by the consultation paper and there is a shared understanding that there is currently no definitive solution assessing engagement and impact and there are strengths and weaknesses to many of the proposed models.

UA strongly supports the paper's focus on university 'processes' and 'approaches' to research impact in preference to pioneering impact metrics. While metrics may say something about reach, they would be highly contestable in their capability for providing a meaningful insight into impact.

In particular, UA notes that the success of 'supply side' policy initiatives such as the engagement and impact assessment will be limited unless supplemented by targeted 'demand side' incentives to encourage industry and other end-users to 'reach into' universities. Australian universities and end-users must work in close partnership if we are to create the new products, processes and industries needed to secure future prosperity. The involvement of end-users in the development of an engagement and impact assessment will be essential to the success of this initiative.

Irrespective of the approach taken, any assessment exercise should:

- balance the cost of the exercise against the benefit;
- focus on those activities that are under the control of universities;
- not impose an excessive administrative impost on universities;
- ensure there is sufficient involvement of research end-users in the assessment process;
- actively encourage and support interdisciplinary, multidisciplinary and multijurisdictional research;
- utilise a suite of indicators and measures that allow for a consistency of approaches across a multitude of research areas; and
- be reviewed upon completion to determine its fitness for purpose.

Feedback Questions

Definitions and scope

1. What definition of 'engagement' should be used for the purpose of assessment?

The ATSE definition included in the consultation paper is sensible and comprehensive, provided 'resources' is interpreted broadly and is not conflated with income.

2. What definition of 'impact' should be used for the purpose of assessment?

The definition created by the ARC and other Australian public research organisations is clear and comprehensive.

For the purpose of assessing university performance, however, impact should be determined at the point at which research is first used by an external party. How the research is used and further developed from this point on is beyond the control or responsibility of the university. With each new use or application of the research, the connection between the original research outcome with the university grows weaker and it becomes more difficult to map a direct relationship. Adopting such an approach would help address issues of time lag and attribution as identified by the Issues Paper.

It may be possible to track specific research over successive rounds of the assessment to identify the longer-term impact of research. While this would provide useful and interesting information on the role that university research plays in driving innovation and advancing knowledge, this should not be the initial focus of the pilot exercise or the basis of assessing university performance.

3. How should the scope of the assessment be defined?

UA supports an approach that encompasses those activities that are under the control of a university; including the activities of academic and professional staff, HDR students and undergraduate students whose contribution to the impact pathway is demonstrable. As a starting point, a core set of comprehensive and robust engagement measures should be identified, with the option for institutions to report on additional measures for peer assessment. The use of case studies to assess impact should be selective and limited. All research disciplines should have the opportunity to be assessed in a manner which allows the value of their research to end-users to be assessed.

4. Would a selective approach using case studies or exemplars to assess impact provide benefits and incentives to universities?

Narrative-based, verifiable, case studies can help universities convey the importance and relevance of research and translational activities, and allow disciplinary and institutional differences to be explained if required. They are also a useful means for demonstrating the processes and approaches adopted on the pathway to impact.

Given the costs of developing case studies we support a selective approach that limits the number of case studies to the minimum needed for illustrative purposes. The costs of the UK REF impact exercise has been estimated at approximately £7,500 per case study and £4,500 per case study template report, with a total cost of £55 million for nearly 6,700 case studies.¹ Given the UK experience and the considerable costs incurred, an assessment exercise focusing on a smaller number of case studies per

¹ Manville, C., Jones, M. Frearson, M., Castle-Clarke, S., Henham, M., Gunashekar, S., and Grant, J., 2014, *Preparing impact submissions for REF 2014: An evaluation*, RAND Europe, p. xvi.

institution would be sensible, with the number of case studies to be advised by the Technical Working Group.

5. If case studies or exemplars are used, should they focus on the outcomes of research or the steps taken by the institution to facilitate the outcomes?

While both are relevant, it is important to note that this assessment initiative sits within a broader research and innovation policy framework, that includes numerous policies and programmes that encourage and incentivise research translation and end-user collaboration. While the case studies should, for completeness, cover outcomes at least at the first point of impact, for the purposes of assessing university performance, the emphasis should be on the steps taken by universities to facilitate the end-use of research. This approach is consistent with the Government's policy objectives to promote the translation of research and encourage end-user collaboration.

While a focus on the overall benefits and value of university research to end-users is important and should remain a key feature of the case studies, universities should not be penalised where research has generated limited outcomes for the end-user, such as where the engagement process is only partially implemented and thus unable to generate significant impact, or the end-user has not facilitated the outcome.

6. What data is available to universities that could contribute to the engagement and impact assessment?

- i. **Should the destination of Higher Degree Research students be included in the scope of the assessment?**
- ii. **Should other types of students be included or excluded from the scope of assessment (e.g. professional Masters level programmes, undergraduate students)?**

The consultation paper captures the existing data available to universities, including exhibition attendance and audience numbers, media monitoring and social media.

The destination of Higher Degree Research (HDR) students into industry positions should be included where possible. The recruitment of skilled graduates is one of the most important mechanisms through which industry derives economic benefits from publicly-funded research. The distribution of the research workforce in Australia has been consistently highlighted as an issue for the absorptive capacity of industry and a barrier to research–industry collaboration and innovation. Unlike many other nations, the majority of Australia's researchers are employed in the higher education sector. The engagement and impact assessment should reward efforts to integrate industry best practice into curricula, to enable the production of career-ready graduates, and the promotion of researcher mobility.

However, there needs to be some recognition that collecting nationally consistent and robust data on the destination of HDR graduates may take more time than other measures. Data on the destination of HDR students has been difficult for universities to collect and retain—particularly in relation to destinations five to ten years post-graduation. Individual universities have been making a concerted effort to improve their collection and use of this data.

A unified national approach to the collection of HDR student data outcomes would be welcomed by the sector. The Department of Education and Training is currently consulting on arrangements for monitoring and benchmarking of HDR student outcomes as part of the new research block grant arrangements for universities. Separately, the ACOLA Review of Australia's Research Training System recommended a national longitudinal data collection exercise on course satisfaction, course completions and career outcomes for HDR training. It is essential that these streams of work are brought together and a single, consistent and national approach to the collection of HDR student data outcomes be adopted.

The inclusion of students of other programmes with a substantial research component should be considered further by the Working Groups.

Key issues

7. What are the key challenges for assessing engagement and impact and how can these be addressed?

The key challenges for assessing engagement and impact have been discussed extensively over the last 10 years and are well captured in the consultation paper. It is critical that indicators are robust, transparent, well understood and promote the desired behaviours. It is also essential that, as a suite, the indicators do not advantage one discipline over another. End-user involvement is essential to the success of this exercise.

UA proposes a matrix approach where institutions would select from a menu of indicators that are of value to end-users, to provide insights on institutional activity and its value against various information categories relating to engagement. This approach would enable universities to choose selectively from a common set of indicators, those measures which best illustrate their engagement processes, rather than being forced to report on engagement measure which might have little relevance to their activities. Such a menu of indicators could include revenue-based proxies such as those used in the UK Higher Education Innovation Fund, as well as metrics and qualitative data that are complementary to traditional, citation-based metrics.

Whilst noting the valuable work done by ATSE in developing assessment metrics, income metrics must be supplemented by other engagement indicators. An exclusive focus on income could undermine valuable knowledge transfer activities and reduce collaboration with SMEs that have limited resources to invest. While the engagement indicators under consideration are relatively easy to attribute, linking assessment criteria to staff that move between institutions remains a concern for the sector. For the pilot, universities should have the option of reporting additional engagement indicators for assessment where appropriate.

Collaboration between institutions is an essential part of the translational process and much of the impact from Australian research is derived from long-term collaborative partnerships. It is essential that the engagement and impact assessment does not discourage multi-institutional collaboration in the research or translational process.

In terms of case studies, the UK REF provides one model, but there have been a range of issues raised during the course of the REF, particularly in relation to cost versus benefit. As impact can only be subjectively assessed rather than objectively measured, as is the case with engagement, it is essential that the assessment criteria is robust and transparent. It is also critical that end-users are involved in the assessment of the processes that universities put in place to facilitate outcomes and in the subsequent impact of research over time.

8. Is it worthwhile to seek to attribute specific impacts to specific research and, if so, how should impact be attributed (especially in regard to a possible methodology that uses case studies or exemplars)?

The consultation paper clearly articulates the challenges of attributing an outcome to a particular research project and in capturing the complexity of the innovation process. As outlined in our response to Question five, attribution would be clearer and more transparent if the case studies focused on the processes adopted by universities to support the end-use of research rather than tracking the outcomes of specific research, particularly given that the pathway to impact tends not to be linear in nature. It is of paramount importance that the focus of the exercise is on showing the ways in which the outcomes of

university research are of value to the relevant end-user. As such the issue may be one of identifying contribution to the impact pathway rather than attempting to attribute specific research to specific impacts.

Issues of attribution might be resolved provided there was clarity and transparency around the assessment criteria, and only a small number of case studies would need to be produced. This would assist the sector identify and select case studies where a pathway to impact could be more readily attributed.

9. To what level of granularity and classification (e.g. ANZSRC Fields of Research) should measures be aggregated?

If the assessment exercise is to achieve the Government's policy objectives, universities and funding agencies will need shift their focus from conventional research discipline-based groupings to a focus on end-users of research. Whilst acknowledging the principles of the Fields of Research (FOR) and their utility in categorising university research, an end-user focus based on broad outcomes or industry classifications should be trialled in the pilot. This would encourage universities to convey the outcomes and beneficiaries of their research from an end-user perspective.

The Excellence in Innovation for Australia (EIA) trial found that the use of ABS Socio-Economic Objective (SEO) codes were generally effective for impact case studies, noting that it required a wide range of expertise from the panels. A further option would be the use of Australian and New Zealand Standard Industrial Classifications (ANZSIC).

Whichever classification is adopted, a small number of broad-based groupings would be most valuable in generating a wide range of outcomes and beneficiaries of university research.

10. What timeframes should be considered for the engagement activities under assessment?

As a general principle, the timeframe for engagement activities should align with ERA. ERA has been a successful model for driving behavioural and cultural change in universities and similar timeframes should apply to the engagement process. From an operational perspective, scheduling future rounds of the engagement and impact assessment in tandem with the ERA process would be practical and may minimise the administrative burden for the university sector.

11. What timeframes should be considered for the impact activities under assessment?

The timeframes for impact activities will depend on the model adopted for impact assessment and the definition of impact. Should the UK REF model of 15 years be adopted it would be appropriate that similar timeframes for attribution should apply. In light of the UK's REF experience, UA supports an approach of using discipline-specific timeframes, noting that the classification of disciplines would depend on the level of granularity and classification chosen for the impact assessment.

If a model is adopted that focuses on initial end-use of research as the demonstration of impact then a shorter timeframe would be possible.

12. How can the assessment balance the need to minimise reporting burden with robust requirements for data collection and verification?

Universities agree that ensuring a robust process is paramount, and recognise that some level of additional reporting may be required to achieve this, particularly in relation to impact where there are few indicators already available. UA supports a more selective approach that requires fewer case studies

than the UK REF. Where possible, the assessment should leverage existing data sources and align reporting processes with existing reporting requirements.

In relation to the case studies, care should also be taken to balance the need for independent, third-party evidence with the need to minimise the burden on end-user partners who would be required to provide this evidence.

13. What approaches or measures can be used to manage the disciplinary differences in research engagement and impact?

Allowing universities to report on a broader suite of measures, incorporating peer review, and focusing on end-user value will help manage disciplinary differences. Whilst recognising the utility of income and commercialisation metrics, consideration of these indicators in isolation will not capture non-commercial activities underpinning the impact pathway, particularly for the humanities, social sciences and creative industries.

14. What measures or approaches to evaluation used for the assessment can appropriately account for interdisciplinary and multidisciplinary engagement and impacts?

The priority should be to ensure that all research has the opportunity to be assessed. Using outcomes-focused groupings and classifications could better support interdisciplinary, multidisciplinary and emerging areas of research as it would not need to distinguish disciplinary differences. Allowing research outputs to be categorised as interdisciplinary, as already occurs with ARC grants, would ensure better cross-referencing across panels and assignment to assessors with appropriate expertise and understanding.

Types of engagement and impact indicators

15. What types of engagement indicators should be used?

A mixed approach relying on peer review and a broad suite of indicators that are of value to end-users of university research should be tested in the pilot. The Technical Working Group should identify core set of indicators based on existing data sets from which universities may choose to report on, with the option for universities to report on additional indicators as appropriate. It is important that the assessment of indicators takes into account the contextual differences between disciplines and institutional processes and strategies.

16. What types of impact indicators should be used?

Assessment by peer review or assessment panels of case studies supplemented by metrics of the institutions' choosing should be trialled in the pilot process. Assessment should focus on the quality and capacity of the institution's approach to transferring and translating knowledge and seek to determine that the policies, procedures and processes that underpin the culture needed to effectively drive research translation, are in place.