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## Aligning assessment and credentialing to the development of learning capabilities

While many school leaders accept that it is possible to teach, assess and recognise the degree to which students have attained capabilities for learning, a range of professional questions around *feasibility* remain. Examples of questions include:

- » How can complex capabilities be represented as learning outcomes in ways that support teachers to understand the trajectory of capability development?
- » To what degree is it feasible for schools to teach, assess and report on these capabilities? Do they have the necessary resources and organisation?
- » How can valid, reliable, comparable and scalable assessments be developed, given that these capabilities cannot be assessed adequately using traditional assessments, such as exams and tests?
- » How can the degree to which students have attained expertise in capabilities be recognised in ways that have utility and value for students and stakeholders, as well as sufficient flexibility to support different needs and requirements?

## Poem: assessment of complex capabilities

**Assessment is a process**  
 of systematically observing what people say, do, make or write  
 during a relevant performance  
 which requires proficiency in the competence of interest  
 and using these observations as evidence  
 to support an overall judgment  
 about the position of the person  
 on a standard scale of expertise from less expert to more  
 indicating what they know and can do  
 and what they need to learn next  
 with a sufficient degree of precision  
 to allow recognition and reporting of the level of attainment

Figure 3. Contemporary definition of ‘assessment’ applicable to the assessment of capabilities for learning.

## The idea of assessment

In this paper, ‘assessment’ refers to the contemporary conception of judgment-based, developmental, competency-oriented, standards-referenced assessment<sup>29</sup>, as articulated in Figure 3.

Assessment is conceptualised here as the process of gathering and synthesising diverse evidence, based on observations of what students say, do, make or write during a performance designed to elicit behaviours known to be associated with competence in the capability concerned and using these to make judgments of where on a continuum of competence the learner is placed, from low to high. If credentialing is required, judgments need to be reported so that these are referenced to external standards and trusted by stakeholders, with the basic qualities of validity, reliability, comparability, interpretability and utility applied.

Central to this approach is the need to include *performance-based assessments* as part of the assessment mix. Traditional assessments such as essays, multiple-choice responses, short answers and standardised tasks are insufficient. Students need to perform, create or produce in order to demonstrate their capabilities, often in a social environment and in response to particular challenges. Performance assessment typically requires use of combinations of evidence and assessment methods, including 360-degree profiling, judgments by peers, teachers, employers and/or other stakeholders, self-assessment, portfolio, presentations, actual performances and even robot-based performance assessments.

This approach to assessment demands significant effort and engagement by assessors. A clear continuum or scale of competence needs to underpin judgments about performance. It is insufficient and inappropriate to merely attach a number to a student, ‘grade off the curve’, compare students, or rank them without reference to criteria or standards that specify the degree to which learning meets requirements.

The rationale for this assessment approach is to position a learner in their journey as they develop competence within a domain, so it can be applied not just to assessment of capabilities for learning, but also to any complex learning outcome, including professional competence, or expertise in a domain or discipline.

In any particular instance of assessment, a range of considerations will shape the assessment design, such as timing (before, during or after the learning; episodic or continuous), purpose (formative or for reporting; high stakes or low stakes), the designated assessors (self, peers, teachers or others) and the degree to which technology will be used (from not at all to completely automated).

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**The key idea, however, remains: assessment is designed to judge and subsequently report on, with reasonable precision, what learners know and are able to do and what they still have to learn to further develop their capabilities.**

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## What is recognition?

In this paper, 'recognition' refers to the process of using assessments to determine and certify the degree to which an individual has attained a particular level of competence, in a report or a credential. Reports and credentials are a form of currency for learning, thus carrying social value and utility. They are relied upon by parents and external stakeholders, including recruiters or assessors for work or further study opportunities. Hence, any report or credential should provide clarity about what individuals know and can do, preferably referenced to set criteria or standards that reflect common understanding of the capabilities required for a particular purpose, such as performing a job or successfully completing a course of study.

Common forms of recognition include school reports, certificates, degrees, licenses, diplomas, badges, or stamps. Recognition can be outward facing, for perusal by others and/or for internal use, such as to provide motivation for learners, acknowledging individual and group achievements and organisational evaluations. The form of recognition will vary depending on purpose and whether it is considered low stakes or high stakes. Similarly, the longevity of the recognition will vary, such as weeks for a school report, to many years for a professional certification.

## Micro-credentials

In more recent times, a newer form of credential, the micro-credential, has demonstrated utility for organisations seeking to recognise learning of complex capabilities.<sup>30</sup> Micro-credentials do not have a standardised form and a range of other terms may be used also to refer to micro-credentials, such as micro-certs, nano-degrees, or badges.

The form of micro-credential relied on here adopts the approach introduced originally by the Mozilla Open Badges Infrastructure (OBI), an open-sourced platform that manages a network of entities and objects associated with digital badge credentials.<sup>31,32</sup> A digital badge typically comprises a simple graphic, together with digital metadata, describing the criteria, standards and assessment required for credentialing, as well as other features, such as expiry dates, where and when the credential was earned and the identity of the assessor or warrantor. Extra digital information may be supplied to illustrate or amplify assessments, such as portfolios, videos of performances, examples of production, artefacts, essays and so on.

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Micro-credentials in this form have a number of key characteristics that make them suitable for recognising capabilities for learning. The main attraction is that they can be used as valid and reliable indicators of the level of attainment of complex capabilities, especially when aligned with developmental, performance-based assessment. Particular characteristics of micro-credentials include the following:

- » They provide a flexible means of certifying attainment of specific elements of learning, in contrast to those covered in conventional academic awards or subject records, which may provide little specific guidance about the actual capability of holders. Traditional credentials require 'seat time' in long courses of study, but do not assess key outcomes. A micro-credential targets specific learning and may not depend on any particular duration for learners to complete requisite work: it can apply to a week's work or to learning that takes many years. The key point is that the precise learning being certified is specified.
- » They are simple and easy to interpret by learners, teachers, parents and stakeholders, providing sufficient detail and precision about what learners know and can do, for specific capabilities and for particular purposes.
- » They can be used to recognise prior learning and are transferable to a range of contexts beyond the original credentialing context. They do not depend on a particular approach to the organisation of learning.
- » They can be 'stacked', so that a person can collect micro-credentials over time that can be designed to add up to a larger credential.

The OBI conception of a ‘badge ecosystem’ has also been adapted. This involves identifying formally anyone who has interests in any credential, including interests that may be competing. The idea of an ‘ecosystem’ assists in identifying how interests align, and how best these interests can be reconciled. These categories can include:

#### A credential issuer:

The organisation that creates a credential, defines the capabilities to be developed, sets standards for learning and ensures that the credential is trustworthy and meets stakeholder requirements and expectations. The issuer may be responsible also for performance assessments, but, in any event, must provide an interpretation of what individuals have learned and can do.

#### Assessors:

Provide expertise in assessment, the setting of standards or criteria, validation, calibration and warranting of attainment. They provide technical leadership and/or support to engender trust in the credential and underwrite aspects of quality.

#### Credential earners:

The individuals who earn the credential, by meeting the standards set by the issuer/s and assessed by the assessor. They produce the evidentiary base used to support judgment about their learning.

#### Collaborators and stakeholders:

Individuals and organisations, such as parents, employers, professional or industry associations, other endorsers and even sections of the general public, who have an interest in the information provided in the credential, or to whom an earner wishes to demonstrate their competence.

One reason for using micro-credentials in the ARC work is that they can be used to make visible the learning of complex outcomes, such as capabilities for learning, supplementing and, in some cases, bypassing the credentials typically used in senior secondary, vocational or university certificates, which are usually silent on the degree to which learners have attained capabilities. Micro-credentials have the flexibility, transparency and responsiveness to meet specific needs, without diminishing integrity and trustworthiness.

The highly elaborated OBI schema for defining micro-credentials and a micro-credentialing ecosystem is not universally accepted or desired. Critics point to the possibility that systematisation and structuring of formerly unstructured or informal learning risks devaluing un-credentialed learning; that more credentials are not needed; that micro-credentials might encourage gamification of learning that will undermine intrinsic motivation for learning; and that individuals already disadvantaged by lack of educational opportunity may be further marginalised.

Perhaps, other models and approaches might achieve the same ends, such as providers engendering an *expectation* that complex capabilities have been developed and assessed, though not explicitly specified, in standard reporting.

The organisations referenced in this study certainly did not all employ the fully elaborated ideal of a micro-credential. Some organisations, such as Beenleigh, are presently limiting their recognition to paper-based reports. Others, such as LVA and Big Picture, have adopted or are adopting a fuller approach (see the case-study profiles in Appendix 1 for further detail). Nonetheless, the idea that a micro-credential is useful in reporting detail about actual attainments in specific areas of interest to an ecosystem of stakeholders has currency for people working in this space.

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**Micro-credentials have the flexibility, transparency and responsiveness to meet specific needs, without diminishing integrity and trustworthiness.**

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#### Warranted standards

In the work of the organisations featured in this report, a strong warrant for credentials was sought. Issuers of micro-credentials wanted to give stakeholders reasons to trust the credential for what it is meant to recognise. Similarly, most organisations required referencing of reports and credentials to external benchmarks and standards, where available and comparable. Considerable effort was put into generating trust and comparability, as the organisations work towards achieving ARC’s ‘gold standard’ for a warranted and trusted micro-credential (see Figure 4).<sup>33</sup>

A key strategy for engendering trust used by the organisations was to follow the methodology outlined in Figure 5. This methodology has in-built features that support trust: co-designing with stakeholders the definitions of what learners need to know and be able to do; agreeing with them on the form, purpose, value and utility of any micro-credential, report or profile; developing and testing high-quality assessment frameworks; mapping outcomes to existing standards frameworks, such as the Australian Core Skills Framework (ACSF) and Australian Qualifications Framework (AQF); designing assessments for authenticity, reliability, validity and interpretability; conducting formal quality checks; instituting internal moderation processes to assist in ensuring consistency of assessments; and so on.

In the absence of a widely understood standards framework or currency for recognising complex capabilities, some issuers also sought a strong *independent warrant* for their credential. For instance, in the case of Big Picture, an additional component of the warrant is to depend on endorsement of quality by a trusted authority, such as the University of Melbourne.

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## The gold standard



The credential represents, with a specified level of precision, the degree to which the credential holder has mastered a specified capability or set of capabilities or competencies that have value and utility and are easily interpretable for the stakeholder. The issuer should provide evidence and a warrant, to that effect.

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Figure 4. ARC's 'gold standard' for warranting micro-credentials.

## Methodology for assessment and recognition of complex capabilities



Figure 5. Methodology for assessment and recognition of complex capabilities.

05.

### Small-scale pilot testing



Trial and review assessments and guides



Refine/finalise assessments and related materials

06.

### Large-scale testing and calibration



Assess candidates, collate and record evidence



Examine psychometric quality of assessments; calibrate



Calibrate assessments to establish performance benchmarks and cut points for credentialing referenced to external standards



Field test reports and credentials with all stakeholders



Finalise empirically verified assessment frameworks, guides, reports and credentials



Document validation and warranting argument and the reasons why the assessment is fair and trustworthy

07.

### Implementation and monitoring



Feedback from stakeholders



Check feedback from learners



Check feedback from warrantors and assessors



Check real-world utility

#### Note on Element 3

Of the essence is to design creative and engaging assessment tasks, specific to the context. Tasks should elicit observable behaviours from candidates, to support judgments of learners' levels of competence and should allow individuals with different levels of expertise to demonstrate their competency. One task can be designed to target one or multiple indicative behaviours, for one or many competencies.

#### Note on Element 4

Of the essence is to ensure that any assessment documentation is easily interpretable, developmental, has utility for stakeholders, and allows for comparison to standards.

#### Note on Element 5

Of the essence is to ensure that the assessment materials and supplementary materials are comprehensive, clear and easy to use and that online functionalities work. Observations by assessment experts and focus groups support optimisation of stakeholder experience as well as utility.

#### Note on Element 7

Of the essence is to continue to monitor and improve the validity of the credential, i.e., is it credible, fair, dependable, trustworthy, sufficiently precise, interpretable, fit for purpose, balanced and proportionate, with no unintended consequences?



## Learner profiles

Commitment to the idea of a learner profile was strong in many of the projects described in this paper. Figure 6 shows examples of learner profiles in development. The first example (Figure 6.1) is a prototype Final Candidate Report developed for the VAPA project. While the final form of the reporting is not yet finalised, the prototype was designed to highlight a candidate's level of readiness in five different professional practice areas, as illustrated by the black dot on each blade in the propeller-shaped figures.

The second example (Figure 6.2) is a Learner Profile from Beenleigh State High School in Queensland, Australia. The Learner Profile captures a range of information about the student, such as the student's performance in academic subjects, qualifications attained, attendance rate, level of competence in employability skills and badges from other achievements and participations.

In the third example, the Assessment Research Centre 'chrysanthemum' prototype learner profile provides an overview of a learner's level of competence in different domains and disciplines. The design allows the use of different shapes and colours to represent different categories of skills and competencies. The concentric circles aid comparability by referencing standards. Changes in levels across time can also be represented in the figure using solid lines within a 'petal'.

The elegant Mastery Transcript is the fruit of much work by schools in the US under the auspices of the Mastery Transcript Consortium. They have privileged attainments, judged by schools, in the general competencies, with information about more traditional programs and out-of-school program represented around the core. Each one of these Profiles has a lot of work behind them, covering stakeholder consultation, assessment design, having students undertake performance tasks, design of metadata, conduct of professional training, building of evidencing systems, and so on.

## Designing assessments and credentials

Robust methods for assessing and recognising capabilities for learning are emerging. These enable reporting of levels of competence that can be trusted by learners and stakeholders external to the immediate credentialing environment. As argued previously, the kinds of assessment methods common in schools, including standardised tests, exams, essays and short-form quizzes, are insufficient.

The methodology adapted by many organisations profiled in this paper involves a multi-element process developed by the ARC, as outlined previously in Figure 5. It is based on the definition of assessment provided earlier (see Figure 3). It uses judgment-based, developmental and standards-referenced assessment methods, to generate evidence elicited from the performance of complex tasks, in and across domains of learning. Each capability is conceptualised carefully as an ordered sequence of teachable, increasingly sophisticated constellations of behaviours that are described in progressions or continua.

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At the core of any progression is the idea of emerging competence in the performance of challenging tasks. Such progressions can be used to devise a practical assessment framework for any capability, suitable for use in particular contexts. Synthesis of evidence from multiple sources and generated in a range of contexts is required. Using evidence from performances, moderated judgments can be made by teachers and others. Micro-credentialing processes provide the tools and ways of thinking that are helpful in understanding the characteristics of a credential; one that will be trusted to represent the degree to which a person has attained a complex capability.

The degree of mastery should be referenced to common standards, be represented in an easily interpretable manner and be comparable to other forms of recognition of the same capability (or equivalent). Learner profiles can be generated as a useful way to provide readily interpretable reports on the full range of student attainments.

Most of the organisations whose work is described in this paper started from scratch in the development of their assessments, reports and credentials. They started at Element 1 of the methodology (see Figure 5) and proceeded, often in untidy stop-start loops, to get the result they wanted.

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**Nevertheless, the methodology is robust and supports the argument for the trustworthiness of the credentials generated. The process is not linear: it is typically iterative. It can be used by any organisation to assess capabilities for learning or other complex competencies, be these schools, official authorities, professional associations or universities.**

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Not every organisation can or should adopt all of the elements of the methodology, as not every organisation is seeking to establish the highest level of warrant for a credential that would hold up, for instance, against standards for assessments set by regulatory authorities. However, each organisation in this paper used an approach informed by the methodology, adapted to reach the level of precision and trust they required for their purposes.

The whole process can be quite lengthy. In the LVA and VAPA projects, for instance, the first element itself required a number of workshops with a range of stakeholder representatives. These workshops were conducted over many months, providing stakeholders with the opportunities to understand the purpose, value and utility of the planned work. For other smaller-scale projects, such as those conducted within a school, the first element can still take a few months.

# Communication Skills Assessment Framework

Communication skills: How people deliver and receive information so that the message is understood

<p>Quality Criteria (low to high)</p>			3.3 Tailors method of delivery to suit circumstances	4.3. Adapts own style to suit audience and context	5.3 Adapts pace within changing context
	1.2 Considers context and audience when delivering content of message (e.g., simplifies language)	2.3 Draws on content and context when timing delivery	3.2 Matches method to audience or content of message	4.2 Matches style to context and audience	5.2 Matches pace to context
		2.2 Follows protocols/policies			5.1 Uses consistent pace
	1.1 Relays message	2.1 Delivers message without consideration	3.1 Uses personal preference	4.1 Uses delivery style that is comfortable	
	<b>Insufficient evidence</b>	<b>Insufficient evidence</b>	<b>Insufficient evidence</b>	<b>Insufficient evidence</b>	<b>Insufficient evidence</b>
<b>Indicators</b>	1. Delivers content of message	2. Times delivery of message	3. Selects method of delivery (e.g. email, phone call, face-to-face)	4. Selects delivery style (e.g. tone, appearance, volume, etc)	5. Paces delivery
<b>Skills or Capabilities</b>	<b>Delivers message</b>				

**Progression**

6.4 Varies language based on audience reactions	7.3 Redelivers message to confirm understanding		9.3 Transforms interaction into positive for all parties involved	<b>At this level, individuals adapt or tailor their communication method and style to maximise the impact on their intended audience.</b> They adapt/tailor their delivery method and style in response to audience needs and reactions and to the circumstances surrounding the context of communication. In delivering messages, they make judgments about the level of understanding of their audience using information gathered through the checking process and re-deliver the message to help their audience reach understanding, if required. They transform the interaction into positive for all parties involved when resolving issues.
6.3 Matches language to suit audience	7.2 Determines level of understanding (of audience)	8.2 Uses checking strategies to seek clarity (e.g. checks details, repeats message back/ asks questions)	9.2 Proposes solution for potential issues	<b>At this level, individuals consider the context and audience when communicating with others.</b> They time their delivery and match their delivery methods, delivery styles (e.g. tone, volume, pace, language) and the content of the message to suit the audience and context. They make judgments about the level of understanding of their audience. In responding, they use checking strategies (e.g. repeating message, asking questions) to seek clarity and propose solutions for potential issues.
6.2 Uses a recognised standard within organisation	7.1 Asks questions to clarify audience understanding			<b>At this level, individuals start to demonstrate consideration of the audience and context.</b> In delivering messages, they follow set protocols or policies and consider recognised standards within the organisation. They tend to use a consistent pace to deliver their message. They ask questions as a way of checking understanding of their audience.
6.1 Uses language based on personal preference		8.1 Acknowledges response	9.1 Acknowledges potential issues to be addressed	<b>At this level, individuals react and respond to communication situations.</b> They tend to use a single or default method of delivery in all situations, without considering the audience or context. They only acknowledge others' responses and potential issues.
<b>Insufficient evidence</b>	<b>Insufficient evidence</b>	<b>Insufficient evidence</b>	<b>Insufficient evidence</b>	<b>Level statements</b>
6. Considers language use	7. Checks whether intended message was communicated	8. Checks for understanding	9. Manages response	
<b>Delivers message</b>		<b>Manages own response to audience's reaction</b>		

Figure 7. A sample assessment framework for Communication Skills from Phase 1 of the LVA-ARC collaboration.

## Assessment frameworks

Regardless of the purpose or final outcome of the process, every project developed a quality assessment framework (see Element 2 in Figure 5) for each capability of interest. Figure 7 illustrates a sample assessment framework for Communication Skills, adapted slightly from Phase 1 of the LVA collaboration with ARC. Frameworks such as this are used to guide the design of assessment tasks as well as the collection, generation and sense-making of evidence of learning. Further, an assessment framework can inform teaching and learning, as it clarifies the teachable behaviours that correspond to a learning progression of increasing complexity and sophistication.

The organisations featured in this paper preferred to develop their own bespoke assessment frameworks; they required their own behavioural indicators and quality criteria (i.e., how well the behavioural indicators are performed), despite the presence, in some cases, of generic or off-the-shelf resources available from various education departments and authorities.

The Australian Government is investing in the development of generic progressions for literacy and numeracy and similar materials have been developed by the ARC and the Australian Council for Educational Research (ACER), for example. A range of progression-like materials, generic and specific, of high or low quality, was used as resources and references for adaptation rather than for wholesale adoption. This was due in part to the fact that the big developmental ideas needed to define a progression were rarely evident in off-the-shelf materials: often, the progressions were in fact a list of behavioural indicators.

Further, the development of bespoke assessment frameworks and progressions generated ownership within organisations, ensured that stakeholders (including teachers) had a shared understanding of the meaning and intent of the recognition and supported sensitivity to particular contexts.

## Performance tasks

The development of performance tasks (see Element 3 in Figure 5) in a school context requires ingenuity. In many respects, it is the most challenging part of the whole process. For example, how does one present real, ethical challenges for a student so that their performance can be observed and reflected on by themselves and others? How does one generate a truly collaborative task in History or Mathematics, ensuring that all students work together, even when performing different roles? How does one assess intercultural capability and the ability to adapt to diverse perspectives if the school is largely 'monocultural'? How does one design a task that requires problem-solving skills applied to unfamiliar and ambiguous circumstances?

In the VAPA and LVA projects, for example, assessment designs made use of 360-degree assessments from peers and/or supervisors who had been in a position to observe the candidate in a work environment. These were combined with other internet-based elements, including expert assessment of portfolios, automated objective tests of knowledge and automated performance tests used for moderation. Technology (app) support was provided to assessors and candidates. This design ensured that the process could be scaled, over time and distance, to cover large numbers of candidates within budget.

By contrast, the Big Picture assessment tasks built on their 15-year history of adopting a novel organisation of learning. Learning tasks revolve around students constructing a graduation portfolio, compiled over their years of study.

The portfolio includes an autobiography, a thesis, details of participation in community service and paid employment, as well as more traditional academic pursuits. For certification, these artefacts became the focus of careful, formative, rubric-based judgments made by expert teachers who have close, day-to-day contact with students over an extended period of time.

At graduation, these judgments are carefully synthesised, to form an overall judgment on the level of attainment across all aspects and on each of the core learning requirements.

Draft assessments and supplementary materials are typically reviewed by panels of specialists or content experts, who will check alignment of tasks and items with the specified behavioural indicators. They review the language of the materials to ensure suitability for the chosen context and end users. The review process incorporates identification and amelioration of potential issues in administration, timing, scoring and documentation of assessment results. This review process may be repeated several times and assessment materials are revised and updated based on feedback provided by the reviewers.

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## The technology

The workload associated with designing and implementing this approach to assessment and recognition of complex capabilities is high, often shared among stakeholders, designers, credential designers, progression builders, assessment task managers and assessors. The use of technology is essential.

To support this challenging work, the University of Melbourne made available to its partners an app (RUBY), to supplement standard assessment applications. Processes supported by RUBY not typically supported elsewhere include: management of customised assessment frameworks and their relationship to generic progressions, or standards; management of overlapping progressions, common indicators and standards; management of different types of assessment evidence, drawn from multiple sources; management of judgments made by multiple assessors and synthesising these against levels of attainment for individuals and groups; highlighting Zones of Proximal Development (ZPD) and Zones of Actual Development (ZAD) for individuals; integration of advice on teaching and learning ideas into student reporting; profiling attainments of learners and groups of learners; integration of benchmarking for micro-credentials; integration of assessment and reporting features into customised assessment sites; and, integration of psychometrics services for quality testing of customised assessments.

## Standards

Mapping of assessment to commonly understood standards is critical to building trust. Accordingly, one issue facing all organisations featured in this paper is that Australia's education system still has a very underdeveloped way of thinking about standards for learning capabilities. Few reference points exist that could be used to benchmark standards. Literacy and numeracy standards are exceptions, as well as the pioneering work of research organisations on some aspects of competencies assessment.<sup>35,36</sup> Other exceptions are the complex capability for learning assessments in SWANs, which were subject to large-scale, rigorous and formal calibration by the ARC in order to establish standards. The SWANs progression levels were used to inform the establishment of standards for Levels A to D leading in to the Foundation-level curriculum in Victoria.

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Some other projects were able to map to existing standards to their progression levels. For example, VAPA is referenced against the Australian Professional Standard for Principals and Big Picture's work will be referenced to common standards linked to the ACSF and the AQF. See Appendix 1 for more detail and examples.

## Validation

Every effort is made throughout the process to validate assessments. Continual effort to identify reasons to doubt the assessment's fit for purpose is essential. Ideally, Element 6 (see Figure 5) is rounded off by compilation of those reasons, with a fair and honest assessment of areas of doubt together with the counter case of why the assessments can be trusted. This is called a validation argument. This argument specifies the dependable use and application of the credential, provides guidance on its interpretation and highlights any possible limitations that should be considered when interpreting and using the results.

It is worth noting that the work of validation is never complete. Proper evaluation and monitoring of a credential's fit for purpose and effectiveness often takes time and any required adjustments should be considered normal.

For instance, time will tell whether employers continue to trust that a credential will successfully predict future success, or whether a candidate can count on the credential when being considered for selection or recruitment. The value a stakeholder places on a credential might suddenly change as circumstances vary;

candidates might find ways to cheat, or otherwise circumvent the intention of the credential; the approach might even have unintended consequences, such as devaluing alternate ways of seeking entry to an opportunity.

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