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# The key role of feedback in institutional readiness for programmatic assessment

Michelle Pedlow <sup>a,b</sup> and David Boud <sup>c,d</sup>

<sup>a</sup>Department of Nursing, School of Allied Health, University of Western Australia, Perth, Australia; <sup>b</sup>Centre for Learning and Teaching, Edith Cowan University, Perth, Western Australia, Australia; <sup>c</sup>Centre for Research in Assessment and Digital Learning (CRADLE), Deakin University, Melbourne, Australia; <sup>d</sup>Faculty of Arts and Social Sciences, University of Technology Sydney, Sydney, Australia

## ABSTRACT

Programmatic assessment for learning represents a shift from fragmented, summative assessment practices to integrated, developmental systems where feedback is central to learning. This paper argues that feedback is foundational to programmatic assessment (PAX) implementation. Using feedback as an analytical lens, it examines institutional readiness for the deep structural and cultural shifts that PAX requires, drawing on a qualitative case study of course coordinators across three disciplines at an Australian university. Five interrelated barriers were identified: fragmented feedback, summative assessment reliance, workload constraints, absence of coordinated feedback pathways, and unconstrained educator autonomy. These reflect structural and cultural misalignments with PAX principles. This paper positions feedback as a diagnostic of systemic readiness for PAX implementation. Reconceptualising feedback as central to curriculum and pedagogy enables institutions to move beyond siloed unit assessment to coherent, student-centred programs, offering practical and conceptual guidance to institutions seeking to undertake meaningful assessment reform.

## KEYWORDS

Assessment; feedback; programmatic assessment; assessment design; feedback literacy; curriculum design

## Introduction

Assessment in higher education is under growing pressure to evolve in response to emerging challenges, including the impact of generative artificial intelligence (GenAI) on assuring learning (Lodge et al., 2023). At the same time, educators must adapt their practices and pedagogical approaches as they are ultimately responsible for interpreting and enacting these shifts in ways that maintain the integrity and purpose of assessment. Despite increasing emphasis on formative and authentic assessment, many institutional models continue to rely on discrete, summative tasks at the unit level – practices that have drawn criticism for failing to support long-term learning, deliver actionable feedback, or reflect the complexity of professional capabilities (Torre

**CONTACT** Michelle Pedlow  [michelle.pedlow@uwa.edu.au](mailto:michelle.pedlow@uwa.edu.au)  Department of Nursing, School of Allied Health, University of Western Australia, 35 Stirling Highway, Crawley WA 6009, Australia; David Boud  [david.boud@deakin.edu.au](mailto:david.boud@deakin.edu.au)  Faculty of Arts and Social Sciences, University of Technology Sydney, Sydney, Australia

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& Schuwirth, 2024). In the Australian context, a 'unit' refers to an individual subject or module, while a 'course' refers to a full degree program – terms that differ across international higher education systems. In response, growing interest has emerged in whole-of-program assessment approaches, variously termed programmatic assessment, whole-of-course assessment, or program-level assessment (Schuwirth & Van Der Vleuten, 2011). These models represent a significant shift: rather than treating assessment as isolated snapshots of performance, they aim to support and understand student learning over time, across multiple units, and through diverse forms of evidence (Baartman et al., 2022).

Programmatic assessment (PAX), as articulated by Schuwirth and Van Der Vleuten (2011), exemplifies this shift. It replaces single high-stakes assessments with multiple low-stakes data points collected throughout a program and enables decisions about student competence to be based on aggregated evidence aligned with overarching course learning outcomes (Schuwirth & Van Der Vleuten, 2011). This approach offers a compelling alternative to single-point assessments and mitigates the risks inherent in conventional models – such as over-reliance on isolated performance, limited opportunities for feedback, and reduced capacity to support developmental progression (Heeneman et al., 2021). Within this model, feedback plays a pivotal role, not as a peripheral add-on, but as the central mechanism through which students interpret their performance, guide their development, and work towards program goals (Baartman et al., 2023). In PAX, feedback is not optional or occasional; it is foundational. Some scholars describe this integrated model as *programmatic assessment for learning* (PAL) – a unified approach that combines the diagnostic intent of *programmatic assessment* with the formative emphasis of *assessment for learning*, underpinned by principles such as triangulation, proportionality, and learner agency (Schuwirth & Van Der Vleuten, 2011). While this terminology usefully foregrounds the role of feedback in driving learning, for the purposes of this paper we retain the term programmatic assessment to align with the existing institutional discourse and to focus our analysis on the structural and systemic shifts required for its implementation.

Realising the potential of PAX involves more than just redesigning tasks, it requires deep structural, cultural, and pedagogical shifts (Baartman et al., 2023). Essential elements such as coordinated curriculum design, sustained educator collaboration, and robust institutional support are critical (Torre & Schuwirth, 2024). Without these, feedback remains fragmented, localised, and ineffective, undermining the longitudinal coherence on which PAX depends (Baartman et al., 2023).

This paper advances the discourse on PAX by positioning feedback systems as both a mechanism and a measure of institutional readiness during early-stage PAX implementation at an Australian university. Because PAX is predicated on developmental, longitudinal learning – enabled by iterative feedback – existing feedback practices serve as a gauge for how well an institution is prepared to enact PAX in practice. It does not evaluate the effectiveness of PAX per se, nor does it isolate feedback as a general pedagogical issue. Instead, it uses feedback as a lens to interrogate the institutional conditions that enable – or constrain – PAX. Drawing on qualitative findings from course coordinators across three disciplines (Business, Engineering, and Health Sciences), the paper examines how feedback is designed, delivered, and coordinated, and what this may reveal about institutional readiness for PAX.

The discussion focuses on three key dimensions of implementation: (1) the extent to which feedback practices support longitudinal, program-level learning; (2) the organisational and cultural barriers to feedback integration; and (3) the tensions between educator autonomy and the collaborative structures required for programmatic coherence. By positioning feedback as both a mechanism and a signal of systemic change, this paper foregrounds the critical, and often overlooked, role of feedback in realising the pedagogical promise of PAX.

## Research question and aims

The paper addresses the following central question:

*Do current feedback practices enable the effective implementation of programmatic assessment in higher education?*

To explore this question, the analysis examined how feedback functioned within early-stage implementation of PAX, focusing on three interrelated areas:

- (1) Alignment of teaching and feedback practices: Examining the extent to which teaching strategies and feedback mechanisms within and across units supported student learning and contributed to the achievement of program-level outcomes.
- (2) Cross-unit feedback systems: Investigating the presence or absence of systems that promoted consistent and meaningful feedback delivery throughout the student learning journey.
- (3) Sustainability and educator capability: Identifying strategies to strengthen and sustain feedback practices, including approaches to educator development and mechanisms for course-wide integration.

By interrogating feedback as both a driver and indicator of PAX, the paper highlights critical levers for supporting meaningful, systemic assessment reform in higher education.

## Theoretical framework

While PAX offers a structural model for assessment, it relies on feedback as both a learning tool and a foundational pillar for data aggregation, coaching, and progression decisions (Torre & Schuwirth, 2024). As such, examining feedback reveals the operational viability of PAX at the systemic level. In this context, feedback is not the primary object of inquiry but a conceptual lens to examine the affordances and constraints of embedding PAX in practice. This lens is warranted because feedback both enables student development in PAX and signals institutional coherence and alignment. The analysis draws on Boud and Molloy's (2013) conception of feedback as a reciprocal, dialogic process that supports learner development. This perspective shifts the focus from the transmission of information to the co-construction of meaning, positioning students as active participants in their own learning. Complementing this, Nicol and Macfarlane-Dick's (2006) work on formative assessment underscores the role of feedback in fostering self-regulated learning – an aspiration closely aligned with PAX principles. Carless and Winstone (2023) extend these ideas by conceptualising feedback as a collaborative and iterative process, shaped by both educator agency

and institutional structures. Collectively, these perspectives support a dual view of feedback as both relational and systemic – a practice embedded in broader educational and organisational contexts. This framing enables feedback to be examined not only as a pedagogical strategy, but as a proxy for institutional readiness. Fragmented feedback may signal misalignments in curriculum, workload, or collaboration undermining the longitudinal integration PAX requires. Rather than evaluating feedback quality in isolation, this paper examines how its design, delivery, and continuity may reflect the system's capacity to sustain program-level assessment.

While PAX originated in medical education, whole-of-course assessment models are gaining traction across disciplines. In Business and Engineering, course-wide assessment mapping supports competency development, often culminating in integrative capstones. Portfolio-based approaches – where students curate evidence aligned to program learning outcomes – are also emerging in health sciences, education, and creative fields. These models share key PAX principles: data aggregation, longitudinal feedback, and high-stakes decisions based on sustained learning. These examples position this paper within the wider movement towards more coherent assessment systems in higher education.

## Methods

### *Research design*

The findings are drawn from a qualitative, exploratory single-case study design (Yin, 2018) examining how feedback practices reflected institutional readiness for implementing PAX. The university served as the bounded case, defined by its early-stage PAX implementation. Course coordinators from Business, Engineering, and Health Sciences were treated as embedded units within this single-case design, not as separate cases. The case study explored the extent to which feedback practices reflected the principles of PAX, particularly their ability to support integrated, program-level learning and longitudinal student development. A case study methodology offered rich, contextualised understandings into the interaction between educational practice and institutional structures (Stake, 1995; Yin, 2018). Positioned within a constructivist-interpretivist paradigm, the approach assumed that meaning is co-constructed through dialogue and shaped by context (Amos Hatch, 2023; Creswell & Creswell, 2017). This orientation enabled an inductive, exploratory analysis of how educators understood, enacted, and navigated feedback within the emerging structures of PAX, revealing the systemic conditions shaping their practices.

### *Context and participants*

The case study was conducted at an Australian university during the early stages of transitioning to PAX. Data were gathered from three course coordinators in Business, Engineering, and Health Sciences, selected through purposive sampling for their roles in early-stage PAX-aligned curriculum redesign. These disciplines were chosen due to their competency-based frameworks, accreditation demands, and large enrolments – factors that typically drive interest in program-level reform. At the time, each course was beginning curriculum redesign and contributing to institution-wide awareness of PAX. As

coordinators, participants led assessment design, cross-unit coordination, and teaching team leadership. This positioned them as key informants on both feedback practices and the broader institutional challenges.

### *Data collection*

Semi-structured interviews were conducted via video conference, each lasting approximately 60 minutes. All interviews were recorded with participant consent and transcribed verbatim. Field notes captured contextual observations and emergent reflections. The interview protocol combined open-ended questions with role-specific prompts to enable in-depth discussion. Core prompts explored how participants conceptualised feedback in their role, how feedback was designed and coordinated across units, and what structural or cultural factors shaped these practices. While a broad range of topics was explored, this paper focuses on data concerning how feedback was designed, delivered, and coordinated across units, highlighting enablers and constraints in the shift towards PAX. Particular attention was paid to perceptions of feedback continuity, alignment with course-level outcomes, and the feasibility of embedding feedback as an iterative, developmental process. All data collection activities were approved by the relevant ethics committees prior to commencement (see Section 10).

### *Data analysis*

Interview transcripts were analysed using Braun and Clarke's (2013) thematic analysis framework. This six-phase approach supported the identification of patterns and relationships within the data while maintaining alignment with the central research question. The process involved:

- (1) Familiarisation through repeated transcript review
- (2) Systematic coding of the data
- (3) Grouping codes into initial themes and exploring their interconnections
- (4) Refining and reviewing themes for coherence and relevance
- (5) Defining and naming final themes
- (6) Interpreting findings in relation to the research question and broader literature

Manual, inductive coding allowed themes to emerge organically from participant responses, complemented by deductive analysis to maintain focus on PAX relevant feedback practices (Byrne, 2022). This approach aligned with exploratory case study and interpretivist traditions, aiming to illuminate meaning within a bounded context rather than generate generalisable findings.

### *Reflexivity*

Reflexivity informed the analysis throughout. The first author, an experienced educator and academic leader in curriculum and assessment at the case study institution, held a cross-disciplinary role and was actively involved in PAX initiatives. Though not embedded in the three faculties, they collaborated with

coordinators through university-wide reform projects – shaping both participant selection and research focus. The author acknowledged that professional experience shaped both engagement with the data and interpretive choices (Bright et al., 2024). A reflective journal was maintained throughout the research and documented moments of resonance, potential bias, and evolving interpretations, particularly around assumptions regarding institutional barriers. Peer debriefing served to surface and challenge emerging interpretations, encouraging closer attention to expressions of educator agency. Member checking further enriched the analysis, particularly regarding views on educator autonomy, which participants framed in more nuanced ways than initially anticipated. These strategies supported a contextually sensitive and critically self-aware interpretation of the data and they aligned with the constructivist-interpretivist orientation. The reflective journal supported self-awareness, peer debriefing surfaced assumptions, and member checking clarified meaning, enhancing credibility and contextual sensitivity.

## Findings

Through iterative coding and theme refinement, five dominant themes emerged, each highlighting a barrier to feedback functioning as a developmental, course-level mechanism, as envisioned by PAX. Given the small sample size, themes were constructed based on patterns that emerged across all three disciplines rather than separated by field. While some disciplinary variation was observed in how participants framed certain issues, these were reflected in the interpretive commentary rather than presented as standalone themes. The sections that follow examine each theme in turn, using illustrative participant quotes and interpretive commentary to explore how these challenges constrain feedback continuity and coherence at the course level. In doing so, the paper surfaces critical tensions between current institutional practices and the systemic shifts required to realise the potential of PAX.

### *Fragmented feedback systems impeded longitudinal learning central to PAX*

Participants described a lack of coordination in how feedback was designed and delivered, with each unit functioning as an autonomous entity. This resulted in students receiving isolated, unit-specific feedback that lacked continuity. One participant acknowledged: *'We concentrate on the ULOs [unit learning outcomes], we concentrate on the units and the students passing the units... We're not really looking at the whole course as far as are they getting feedback, the right feedback'*. Another stated: *'It's almost this is your unit, these are your unit learning outcomes, and this is where it ends. The student progresses, but the feedback does not'*. Participants reported confidence in feedback quality within their own units but noted limited follow-through or integration: *'As long as we're ticking the box... they're getting like base knowledge there, but... how they apply that is something that we've probably not been as effective'*.

### **Heavy emphasis on terminal assessment limited progressive learning opportunities**

Participants described assessment architectures dominated by end-of-semester evaluations, shaping when and how feedback was provided: *'It's been centred around the assessment points and less around strategies in the classroom to have feedback throughout the whole semester'*. Another stated: *'Feedback, it's very traditional, focused on the end product rather than the process. Students only find out how they've done at the end of semester, by which point there's little they can do about it'*. Although some shifts towards assignments were noted, exams remained dominant: *'We have a lot of invigilated exams, and we are only just moving towards more assignments. . . I'm hoping we can start to shift. . . That way, students can see real application of the knowledge'*.

### **Institutional priorities and workload models undermined feedback quality**

Participants frequently referred to time constraints and inadequate workload allocations for feedback. *'My allocation for course coordination would not cover that. . . Within the workload [there] is not the workload allocation. . . course coordination at the moment is not reflective of that'*. Another noted: *'Time is the biggest constraint. We don't have the time to do feedback justice, which is why so much of it ends up being tick-box'*. Participants also indicated that institutional emphasis on summative grading and compliance reduced capacity to engage meaningfully with feedback processes.

### **Absence of feedback pathways undermined alignment with course learning outcomes**

Participants described unit-level thinking in feedback design, with limited attention to course-level learning outcomes. *'As a lecturer or as a unit coordinator, I'm focusing on the unit learning outcomes. I'm not focusing on the course learning outcomes'*. Another shared: *'There's no real alignment in feedback across units. It's like each unit is its own world, with little connection to the next'*. Some recognised the potential value of structures like capstones or portfolios: *'It could help students see the big picture, allowing them to curate their learning evidence, showcase progress, and integrate feedback in a meaningful way'*.

### **Lack of collaborative structures perpetuated isolated teaching practices**

Participants described isolated teaching practices reinforced by structural norms and a lack of shared frameworks for feedback. *'Staff, probably through me, have been just absolutely trained to refer students on. . . but that's it, it's the end of semester. You submit your marks, and you move on to the next cohort'*. Another reflected on the inherited nature of these practices: *'I've only been in the course coordination [role] for 18 months now. And that's sort of how it was inherited. . . it was quite siloed in terms of that's your unit, you do your bit'*. Another noted: *'Each unit coordinator generally designs assessments independently, with minimal overarching alignment'*.

These fragmented systems signal a lack of readiness for PAX, which relies on coherent, cross-unit feedback pathways to support developmental progression. While the



interviews invited discussion of both challenges and strengths, participants primarily focused on structural and cultural barriers to feedback integration. This emphasis reflects the framing of the interview prompts, which centred on cross-unit alignment, institutional systems, and program-level design. A small number of affordances were noted, such as emerging portfolio initiatives, but these did not feature consistently across participants. While most themes reflected common patterns, some variation was observed in how participants framed priorities, particularly across disciplinary contexts. These differences are acknowledged in the interpretive commentary rather than presented as separate themes due to the small sample size.

## Discussion

While formative and authentic assessment are increasingly valued, and many institutions have diversified assessment strategies in response, these efforts often remain confined to individual units or subjects. Such shifts mark important progress but do not necessarily achieve the systemic coherence PAX demands. This paper suggests that even where formative assessment is valued, the lack of cross-unit feedback continuity, structural alignment, and shared responsibility for student development can limit program-level implementation. PAX requires not just varied assessment formats, but a reorientation of feedback as a connected, developmental process across time, space, and teaching teams.

PAX offers a compelling framework for assessment reform in higher education, yet its implementation demands more than policy shifts or technical solutions. Sustainable adoption requires deep alignment between pedagogical practices, curriculum structures, and institutional governance. This paper used feedback practices as an analytical lens to assess how closely current systems reflect the principles of PAX. The findings reveal structural misalignments and cultural tensions that constrain enactment. Rather than treating feedback as a standalone pedagogical practice, the analysis positions it as both a central mechanism within PAX and a barometer for institutional readiness. This is because feedback in PAX is not an adjunct, it is the connective tissue that enables coaching and reflection, supports longitudinal learning, facilitates data aggregation, and underpins defensible high-stakes decisions (Baartman et al., 2022; King et al., 2022). As such, when feedback systems are fragmented or misaligned, they reveal deeper structural weaknesses in the curriculum design, collaboration, and institutional support, all of which are essential for effective PAX implementation. Across all cases, feedback practices remained tethered to unit-level structures, summative cycles, and individuals as separate entities – conditions fundamentally at odds with the developmental, course-level learning model PAX demands. This section synthesises these findings around four systemic tensions: the persistence of summative assessment logics, structural inertia in feedback design, fragmented curriculum architectures, and the cultural persistence of unconstrained autonomy.

### *Feedback and the persistence of summative logics*

Despite institutional rhetoric about developmental learning, feedback remained closely tied to high-stakes summative assessment. Participants described feedback as an end-of-cycle activity, delivered after judgements had been finalised rather than embedded within

the learning process. Such practices run counter to the developmental ethos underpinning PAX, which requires feedback to enable students to monitor, reflect on, and adjust their learning throughout their courses (Ajjawi & Boud, 2024; Van Der Vleuten et al., 2012). Moreover, this practice contravenes the core purpose of feedback itself, which, as Winstone and Boud (2022) argue, must occur during the learning process to be meaningful. This summative logic marginalised feedback's role and effectively designed it out of the curriculum. Participants noted that feedback information was frequently appended to final assessments, detached from formative intent. As Baartman et al. (2022) observe, overreliance on high-stakes tasks limits opportunities for iterative feedback loops.

These findings show that, in this context, feedback often operated as a retrospective, compliance-driven task rather than a developmental process. While many institutions have advanced formative assessment, local practices often remain tied to summative cycles. PAX does not inherently produce feedback but structurally depends on it. Without consistent, timely, and cumulative feedback, the model cannot function. PAX thus compels institutions to design feedback as a coordinated, course-wide mechanism, not an optional add-on. Feedback quality within units was seen as adequate, yet its long-term developmental value was diminished by a lack of continuity or integration. Without sequences of low-stakes, feedback-rich tasks (Greenfield et al., 2023) and deliberate course-level scaffolding, feedback remains peripheral. Conceptual clarity about PAX is therefore essential: while many educators recognise the pedagogical value of feedback, PAX requires a shift towards viewing feedback as a longitudinal, course-wide mechanism embedded in curriculum design and not just a localised teaching practice. The absence of such shared understanding leaves feedback disconnected from broader curriculum goals and undermines the coherence PAX requires.

### *Structural inertia and the design of feedback systems*

While participants regularly cited workload as a limiting factor, the findings point to curriculum structure – not just time scarcity – as the more fundamental barrier. Feedback practices were shaped by inherited design logics oriented around unit completion and final outcomes, leaving little room for ongoing, developmental feedback (Govaerts et al., 2022; Payne et al., 2023). Poor feedback practices – whether excessive and unfocused, or sparse and late – often result from inadequate curriculum design rather than limited staff capacity (Nieminen & Carless, 2023). In this context, educators described a compliance-focused approach to feedback, where box-ticking often replaced meaningful dialogue. This reveals a deeper issue: institutional structures position feedback as peripheral, under-resourced, and invisible within workload models. Despite curriculum assurance being a formal requirement under the Australian Higher Education Standards Framework (Tertiary Education Quality and Standards Agency, 2021), course coordination roles rarely included accountability for feedback integration across units. Recent research confirms that feedback design can be both effective and efficient when aligned with curriculum stages (Boud & Dawson, 2023; Pitt & Winstone, 2023). Institutions must act deliberately to redesign assessment architectures, recalibrate workload models, and build educator capability in feedback dialogue. A key priority is teacher feedback literacy (Boud & Dawson, 2023). In the context of PAX, this includes designing feedback processes that are cumulative, coordinated, and aligned with program goals. Boud and Dawson's (2023) empirically-derived framework highlights the importance of intentional design, relational engagement, and strategic

alignment – competencies essential for enacting feedback as a central driver of PAX. Without it, even well-intentioned reforms risk superficial, fragmented uptake.

### *Fragmented curricula and the failure of feedback continuity*

PAX depends on cumulative, longitudinal feedback to support course-wide judgements of student competence (Jamieson et al., 2021; Van Der Vleuten et al., 2015). However, the data showed that feedback remained episodic and disconnected, often misaligned with course-level learning outcomes. Participants described how feedback was confined to unit-level learning, with limited connection to prior or future development. This fragmentation positioned feedback as a discrete, summative event rather than a cumulative developmental process. Students progressed through the course, but the feedback did not follow. In the absence of shared frameworks or mechanisms to track and build on prior feedback, students were expected to independently synthesise disparate pieces of feedback – a task made more difficult by the lack of integrative curriculum structures.

While participants expressed interest in longitudinal mechanisms such as capstone projects or ePortfolios, these were rarely embedded. Digital tools alone cannot solve structural feedback fragmentation (Nieminen et al., 2023). While tools like ePortfolios, dashboards, or repositories can enhance feedback visibility, their impact depends on being embedded in well-designed curricula and supported by shared pedagogical frameworks (Walland & Shaw, 2022). Without coherent assessment mapping, collaborative design, and institutional support, these systems risk becoming administrative add-ons rather than enablers of programmatic assessment for learning. Feedback coherence demands shared rubrics, cross-unit alignment, and explicit tracking of learning progression (Baartman et al., 2022). Without these elements, feedback cannot support cumulative learning, and the developmental coherence PAX seeks to establish remains unrealised.

### *Autonomy without accountability: The cultural challenge*

A final tension relates to educator autonomy. While flexibility supports disciplinary nuance, the absence of collaborative structures perpetuated localised teaching practices. Feedback and assessment design were typically determined independently at the unit level, with limited shared responsibility for course-level goals. Participants reported that such siloing was embedded in long-standing institutional norms and course design inheritances. This unconstrained autonomy undermines the coherence required by PAX. In professionally accredited degrees, where programmatic development of integrated capabilities is essential, fragmented feedback structures weaken both learning and external credibility (Kirwan et al., 2022). As Vangrieken et al. (2017) argue, autonomy without coordination erodes educational integrity. PAX requires a shift towards reflective autonomy (Carless & Winstone, 2023) – professional judgement exercised within clear, shared frameworks. Course-level coordination, assessment mapping, and feedback moderation must become standard practice. Crucially, institutional governance structures must enable and reward collective pedagogical work. While professional development is valuable, it alone cannot address entrenched cultural assumptions; sustained implementation depends on systemic realignment of academic identity, governance, and practice.

## Implications for practice

Findings from this work highlight several practical and strategic considerations for institutions navigating the multifaceted challenges of implementing PAX effectively. Although feedback served as the focal lens, the broader implications extend into curriculum design, educator collaboration, and institutional governance. Crucially, improving feedback practices requires systemic change, piecemeal efforts are unlikely to achieve the developmental aims at the heart of PAX. To support sustainable implementation of PAX, institutions should consider a commitment to collective design and accountability by those all those running it, including the following actions:

- **Design for feedback continuity:** Establish integrated assessment structures that connect feedback across units and align with course-level learning outcomes. Digital platforms such as ePortfolios or centralised feedback repositories can enhance visibility, but only when embedded within a cohesive curriculum framework.
- **Shift assessment priorities:** Reduce reliance on high-stakes summative assessments and increase the use of low-stakes, formative assessments that enable students to engage with feedback iteratively and meaningfully.
- **Reconfigure workload and recognition systems:** Adjust workload models to reflect the time, expertise, and relational work required to provide high-quality, developmental feedback. Formally recognise feedback as core academic work within PAX frameworks.
- **Strengthen educator collaboration:** Foster coordinated and reflective practice by supporting collaboration across teaching teams including cross-unit curriculum planning, shared rubrics, and collaborative assessment design. Such collaboration respects disciplinary expertise and professional agency, enhancing – not replacing – academic judgement. The aim is not to diminish autonomy, but to reduce fragmentation by supporting coherence in feedback practices across the course.
- **Build feedback literacy – starting with educators:** Prioritise professional development focused on designing feedback-rich, coherent learning environments aligned with PAX principles. While student feedback literacy is essential, it must be developed in tandem with system-level changes; students cannot meaningfully engage with feedback in the absence of consistency, continuity, and relevance across the program.
- **Cultivate a feedback culture:** Develop institutional cultures that value feedback as a relational and developmental process. Governance structures should actively incentivise program-level thinking and team-based pedagogical design.

## Limitations and future research

Several limitations shape the scope of this paper. Drawing on a small sample of course coordinators from a single institution, the analysis reflects a particular institutional context and may not capture broader disciplinary or institutional diversity. Conducted prior to the full implementation of PAX, the work highlights the institution's preparedness rather than evaluating post-implementation outcomes. Future research could adopt longitudinal designs to explore how feedback

systems evolve over time, particularly in response to systemic enablers or constraints. There is also a critical need to incorporate student perspectives. Investigating how learners interpret, apply, and track feedback across a program could illuminate opportunities to strengthen feedback continuity and clarify shared responsibility for developmental progression. Future research could also examine the perspectives of individual unit coordinators to better understand how feedback practices are enacted and experienced at the point of teaching practice. Finally, further exploration of digital infrastructure is warranted. Research into how feedback technologies – such as longitudinal portfolios, learning analytics dashboards, or repository systems – can be meaningfully embedded within curriculum structures would offer valuable guidance for scaling integrated feedback systems across programs.

## Conclusion

Seeing assessment solely through the lens of unit learning outcomes fails to reflect the broader educational purpose of a program and can be detrimental to student learning. This narrow view fragments assessment design, disrupts feedback continuity, and limits the development of integrated capabilities. Using feedback practices as an analytical lens, this paper offers a critical perspective on institutional readiness for PAX. Feedback emerges not as a peripheral task, but as the operational mechanism through which PAX achieves its developmental purpose. As such, feedback functions as a powerful diagnostic of institutional readiness, revealing the degree to which course-level assessment practices are aligned with – or diverge from – programmatic principles. The findings suggest that feedback challenges are not isolated issues but indicators of deeper systemic misalignment. PAX cannot succeed through minor or piecemeal reforms. Reframing feedback as central to curriculum and pedagogy is essential, but not enough. It must be supported by broader shifts in institutional culture, workload, and governance to support coherent, longitudinal learning and assessment systems.

## Disclosure statement

No potential conflict of interest was reported by the author(s).

## Notes on contributors

*Michelle Pedlow* is an educator and researcher in higher education assessment and feedback practices at The University of Western Australia. Her research interests include feedback and assessment design, programmatic assessment and educational innovation.

*David Boud* (Deakin Distinguished Professor) is Co-Director of the Centre for Research in Assessment and Digital Learning (CRADLE) at Deakin University, Australia. He is also Emeritus Professor in the Faculty of Arts and Social Sciences at the University of Technology Sydney, Australia.

## ORCID

Michelle Pedlow  <http://orcid.org/0009-0004-8555-1772>

David Boud  <http://orcid.org/0000-0002-6883-2722>

## Ethical approval

Ethics approval for this research was granted by the Deakin Human Ethics Advisory Group (HEAG), approval reference number: HAE-2024–39. Reciprocal ethics approval was also received from Edith Cowan University approval reference number: 2024–05653-PEDLOW.

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