



A better and fairer education system

**Submission to the review to inform the next National School Reform Agreement,
August 2023**

Amy Haywood, Anika Stobart, and Nick Parkinson

Summary

Improving the quality of school education should be a national priority. Better academic results would improve the lives of students and lift workforce productivity.

National and international assessments show Australia has significant room to improve student outcomes. In the next National School Reform Agreement (NSRA), Australia should set its sights higher. The expert panel's Consultation Paper recognises this challenge, noting Australia's uneven performance and calling for reforms that focus on the twin aims of educational equity and excellence.

To boost equity, Australian governments should focus on ensuring all students are equipped with the foundational knowledge and skills needed for success in school and life. Currently, school education is falling short for too many students, including First Nations students, students with a disability, and students from low socio-economic backgrounds. For many students, significant learning gaps are already present when they start school, and these gaps often grow wider as they progress through school.

Australian Education Ministers have established broad and ambitious goals for Australian schools, as set out in the Mparntwe (Alice Springs) Education Declaration. This level of ambition is appropriate. But governments have not yet built an education system that can deliver

on this ambition. Leaders should not be satisfied with rhetoric, when improved results are both possible and essential, especially for disadvantaged children who rely so heavily on effective schools as a pathway to a better future.

The first priority should be to ensure that all students – irrespective of background – have consistent access to the high-quality teaching required to achieve proficiency in literacy and numeracy.

Governments also need to improve health and community service supports for children, so that they are 'ready to learn' when they step inside the classroom. Addressing these issues 'beyond the school gate' will require a whole-of-government commitment to reform that extends well beyond the education sector.

This submission identifies reform options for the NSRA, drawing on Grattan Institute's research on school workforce strategy, teaching quality, curriculum materials, and school improvement. This submission focuses primarily on the Consultation Paper's questions on: Setting targets (Chapter 1); Lifting student performance (Chapter 2); Improving student wellbeing (Chapter 3); Attracting and retaining teachers (Chapter 4); Increasing investment in research and innovation (Chapter 5); and Reporting on progress (Chapter 6).

Recommendations

In the next National School Reform Agreement (NSRA), the federal, state, and territory governments should commit to the following (the relevant Consultation Paper questions are in brackets):

Recommendation 1 (Q5)

- (a) A long-term goal that 90 per cent of students should reach proficiency in reading and numeracy, as measured by the proportion of students in the ‘strong’ or ‘exceeding’ category in NAPLAN in Years 3, 5, 7, and 9.
- (b) As an interim target, each state and territory should commit to an increase of 10 percentage points over the next 10 years, based on NAPLAN performance in 2023, pro-rated for the term of the next NSRA.

Recommendation 2 (Q3, Q5)

- (a) A nationally consistent, mandatory Year 1 Phonics Check for all students, and a re-sit process for Year 2 students who do not meet proficiency benchmarks.
- (b) A goal of 90 per cent of all students reaching proficiency in the Phonics Check by Year 2, with appropriate interim targets established once baseline data are collected.

Recommendation 3 (Q2)

Developing nationally consistent teaching practice guidelines through a process led by the Australian Education Research Organisation.

Recommendation 4 (Q23)

Ensuring that all teachers can access quality-assured comprehensive curriculum materials for all subjects and year levels, including detailed

lesson-level materials along with student assessments, workbooks, and teacher guidance.

Governments should:

- (a) Audit the existing comprehensive curriculum materials, and identify critical gaps.
- (b) Invest in comprehensive curriculum materials to fill gaps, and help teachers to use them effectively.
- (c) Establish a rigorous, independent quality-assurance mechanism, similar to EdReports, to continually evaluate and report on the quality of comprehensive curriculum materials available to schools.

Recommendation 5 (Q16)

Developing and funding quality-assured micro-credentials in evidence-based reading and numeracy instruction, and provide incentive payments to schools that employ teachers with the certification.

Recommendation 6 (Q3)

Embedding a multi-tiered system of support (MTSS) model, including high-quality, small-group tuition for students who require catch-up support, in all schools over the term of the next NSRA agreement.

Governments should:

- (a) give schools clearer guidance on how to embed high-quality, small-group tuition for catch-up support in literacy and numeracy (through detailed practice guidelines on effective interventions).
- (b) invest in rigorous trials and evaluations to refine best-practice guidelines and support, and cost-effective staffing models.

Recommendation 7 (Q11, Q27)

Creating a national student survey to track data on school climate, disruption, and student wellbeing and sense of belonging, to be filled out annually by Year 3, 5, 7, and 9 students as part of NAPLAN.

Recommendation 8 (Q22)

Creating an expert teacher career path in each state and territory. This should include new subject-specific Master Teacher and Instructional Specialist roles.

Governments should ask the Australian Institute for Teaching and School Leadership (AITSL) to:

- (a) Update the Australian Professional Standards for Teachers, to include new, detailed, subject-specific teacher elaborations that articulate the content and skills teachers need for effective teaching in each subject area and for certain year levels (e.g., the early primary years).
- (b) Update Highly Accomplished and Lead Teacher (HALT) accreditation processes to encourage subject specialisation.

Recommendation 9 (Q21)

- (a) Increasing investment in ‘disciplined innovation’ to test new school operational models and ways of working that boost student outcomes. New approaches should be subject to robust independent and publicly reported evaluation, including randomised control trials where appropriate.
- (b) Establishing a new independent agency charged with conducting a thorough review of the adequacy of the wider schools’ workforce to meet Australia’s Mparntwe Education Declaration goals, and make recommendations to strengthen the effectiveness and productivity of the wider workforce.

Recommendation 10 (Q7, Q29)

Reporting on progress on targets and reforms, through a stand-alone annual report tabled in Federal Parliament.

Table of contents

Recommendations	3
1 Set ambitious targets	6
2 Invest in practical reforms to lift student performance	12
3 Improve student mental health and wellbeing	21
4 Attract and retain teachers	24
5 Increase investment in research and innovation	25
6 Report on progress	26

1 Set ambitious targets

The Consultation Paper highlighted that the next National School Reform Agreement (NSRA) ‘should contain reforms and targets that focus attention and investment on priority areas’.¹ This should be ‘clearly stated through firm targets and reform priorities’ and ‘matched by stronger accountability mechanisms to ensure all parties to the agreement are delivering on the shared ambition’.²

We agree. The federal government and all states and territories should prioritise student learning and set ambitious targets for student academic performance. Internationally, there are several examples of systems using targets to focus reform effort.

1.1 Set ambitious but achievable targets

Performance targets have been used successfully in other policy areas,³ and by other high-performing international school systems.

1.1.1 Set high aspirations for student achievement

The academic performance of Australian school students over the past two decades has been lacklustre at best. There is significant scope for Australia to do better.

According to the OECD’s 2018 Programme for International Student Assessment (PISA), two in five Australian 15-year-olds fall short of Australia’s proficient reading standard.⁴ On average, Australian students perform significantly worse in reading than some high-performing

English-speaking education systems, such as England, Canada, and Singapore.⁵ Australia’s results have also fallen significantly since the first PISA assessment in 2000.

Australian students performed worse than students in many other English-speaking countries in primary school in the 2016 Progress in International Reading Literacy Study (PIRLS) assessment (see Figure 1.1). International results in the most recent PIRLS are harder to compare, due to COVID disruptions. But the 2021 results show that about 90 per cent of Singaporean students in Year 4 were proficient readers, compared to 80 per cent in Australia.⁶

The story is worse in maths. In 2018, nearly half – 46 per cent – of Australian 15-year-olds fell short of Australia’s national proficiency benchmark on PISA.⁷ And Australia’s results have slipped every year since PISA began.⁸ Fifteen-year-olds who sat the test in 2018 now lag one year and two months behind their 2003 counterparts.⁹ Just as concerning, the proportion of Australian ‘high performers’ in the PISA mathematics assessment lags well behind that in the top-performing education systems, such as Singapore and Canada.¹⁰

Gaps in student achievement also tend to widen over time. Successful academic learning involves the layering up of new knowledge and skills

1. Department of Education (2023a, p. 9).

2. Ibid (p. 9).

3. For example, childhood vaccination targets (see Department of Health and Aged Care (2023)) and UK hospital wait times. See more in Box 3.3 of Productivity Commission (2023, p. 95).

4. Thomson et al (2019).

5. Thomson et al (2019); and Thomson et al (2017).

6. Hillman et al (2023, p. 21).

7. Thomson et al (2019, p. 118).

8. Ibid (p. 120).

9. Thomson et al (ibid, p. 113). Australia’s mean score in 2003 was 524 and in 2018 it was 491. According to Australia’s PISA report, the difference between adjacent year levels is, on average, 28 points.

10. Thomson et al (ibid, p. 126). In 2018, 10 per cent of Australian students were high performers, compared to 37 per cent in Singapore and 15 per cent in Canada.

on a solid foundation. Missing concepts or skills can impede the take-up of new skills, creating a ‘Matthew effect’ in which higher achievers progress faster in their learning than others.¹¹

This has significant negative implications for disadvantaged students, who tend to start school already behind. In reading, for example, Grattan Institute analysis of 2022 NAPLAN data shows that students in Year 3 whose parents did not finish school were two years and five months behind those whose parents had a university degree.¹² By Year 9, this learning gap grows to the equivalent of more than five years.

Australia can change this trajectory, but governments will need to raise their level of ambition to do so. International jurisdictions such as Ireland, Ontario in Canada, and Mississippi in the US show that significant improvement is possible.¹³ We should follow their lead.

In 2011, the Irish *National Strategy for Numeracy and Literacy* set specific targets to improve reading and maths, in particular setting targets to lift poor performers and stretch high achievers.¹⁴

11. The concept is named after a verse from the Book of Matthew in the New Testament that says the rich get richer, while the poor get poorer. Students with too many gaps in their foundation find it harder to catch up, because it is harder for them to hold the weight of new learning. See further in Stanovich (1986) and Hanson and Farrell (1995).

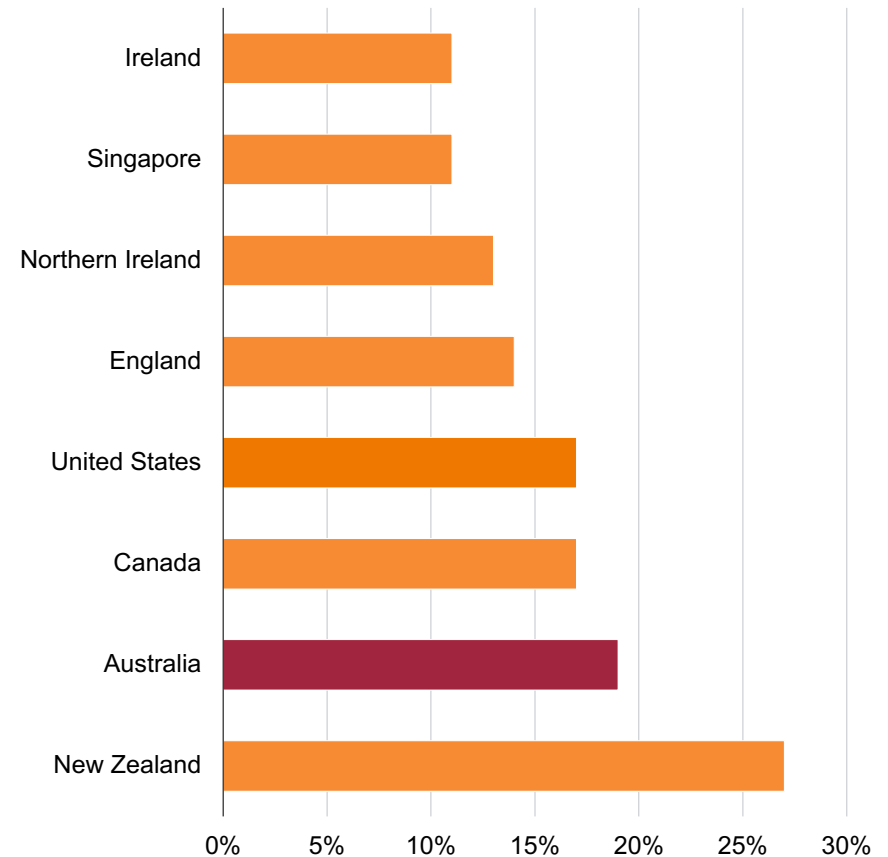
12. Hunter and Sonnemann (2023, p. 8).

13. Other countries such as Singapore, Estonia, and Poland have also made big gains in reading performance in recent years. See Thomson et al (2019) and Hillman et al (2023).

14. The 2011 strategy set targets to ‘increase the percentages of primary children performing at Level 3 or higher (i.e. at the highest levels) in the National Assessment of Mathematics and English Reading by at least 5 percentage points at both second class and sixth class by 2020’ and to ‘reduce the percentage of children performing at or below Level 1 (i.e. minimum level) in the National Assessment of Mathematics and English Reading by at least 5 percentage points at both second class and sixth class by 2020’. At the post-primary level, the 2011 strategy set targets to ‘increase the percentage of 15-year-old students performing at or above Level 4 (i.e. at the higher levels) in PISA reading

Figure 1.1: Australia’s reading performance is poor compared to other English-speaking countries

Proportion of Year 4 students who scored below the proficiency standard for reading, 2016



Source: Thomson et al (2017, p. 18).

literacy and numeracy tests by at least 5 percentage points by 2020’ and to ‘halve the percentage of 15-year old students performing at or below Level 1 (the lowest level) in PISA reading literacy and numeracy tests by 2020’. See Ireland Department of Education and Skills (2011).

Later, Ireland added targets for closing the gap between students from disadvantaged and advantaged schools.¹⁵

The strategy aimed to improve reading and numeracy performance, as measured by Ireland’s national assessments and by PISA, by five percentage points over nine years.¹⁶ In the event, Ireland over-shot most of its original targets in half the time.¹⁷ This was reflected in improved performance against other international benchmarks. In the 2011 PIRLS reading assessment, 85 per cent of Irish Year 4 students were identified as proficient readers.¹⁸ By 2016, the proportion had improved to 89 per cent, pushing Ireland’s international ranking up from 10th place to 4th place.¹⁹

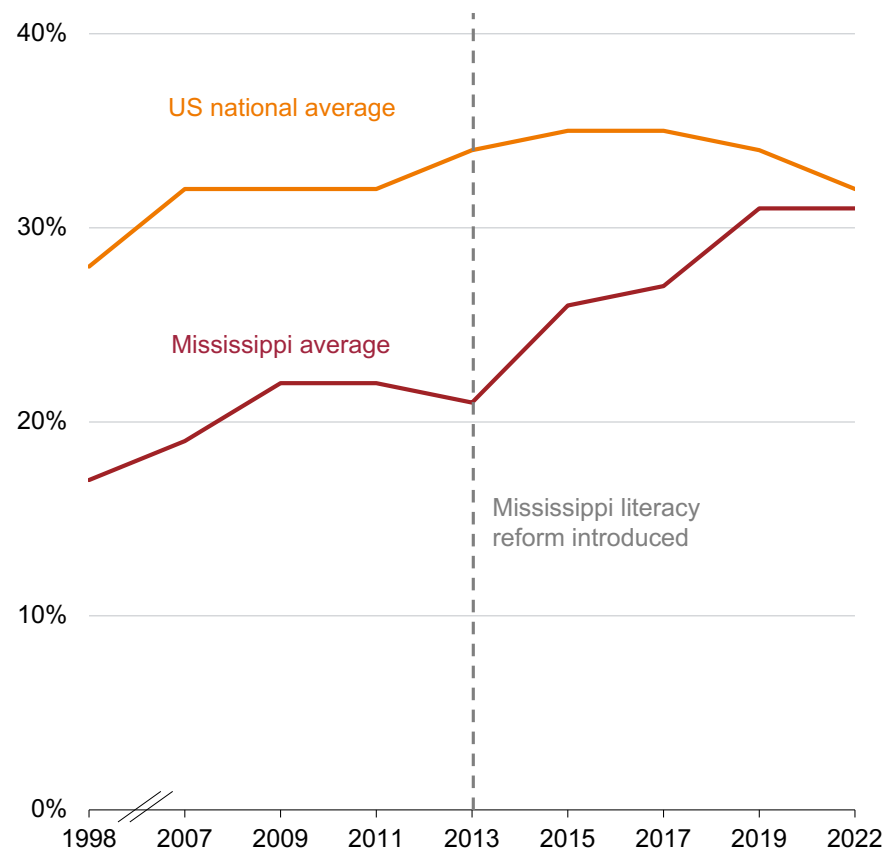
Ontario, in Canada, also set a bold goal to lift the proportion of Grade 6 students meeting the ‘expected level’ of reading, writing, and maths performance from 54 per cent in 2003 to 75 per cent in 2008.²⁰ While Ontario did not meet its 2008 target, by 2014 it had reached 72 per cent – a still-impressive 18 percentage point improvement in 11 years.²¹

Mississippi, one of the poorest states in the US, also significantly improved student performance through a concerted approach to lifting the quality of reading instruction.²² While it did not adopt specific performance targets, it lifted the proportion of students proficient in reading in Grade 4 from 21 per cent in 2013 to 31 per cent in 2022 – a 10 percentage point improvement over 10 years (see Figure 1.2).²³

15. Ireland Department of Education and Skills (2017).
 16. Ireland Department of Education and Skills (2011).
 17. Ireland Department of Education and Skills (2017).
 18. Thomson et al (2012, p. 18).
 19. This ranking might have been one place lower if Croatia had participated in the 2016 test, given that its students performed better than Ireland’s in 2011.
 20. Boyd (2021).
 21. Faughey (2015).
 22. See for example: Loble (2023).
 23. US Institute of Education Sciences (2013); and US Institute of Education Sciences (2022).

Figure 1.2: Mississippi’s performance improved significantly over 10 years

Proportion of students at public schools who were at or above proficiency in the NAEP Grade 4 reading test



Notes: NAEP = the National Assessment of Educational Progress. A fourth-grader performing at the NAEP Proficient level is likely to be able to identify the main idea, and make complex inferences about characters’ actions, motivations, or feelings, using relevant evidence within or across literary texts.

Sources: National Centre for Educational Progress (2022).

Over the same time, the proportion of Mississippi students who were highly proficient in reading in Grade 4 increased from 3 per cent to 6 per cent.

1.1.2 Set academic achievement targets in the NSRA

Australia's governments should agree to ambitious academic targets for reading and numeracy in the next NSRA. The new NAPLAN proficiency categories are likely to be the best measure to set targets and monitor system performance over time.

Students' performance on NAPLAN is now rated as either 'exceeding' (the strongest performers), 'strong', 'developing', or 'needs additional support' (the weakest performers).

Students in the top two categories have demonstrated proficiency, while students in the bottom two have not.²⁴ According to the Australian Curriculum, Assessment, and Reporting Authority (ACARA), the proficiency cut-off point (between the 'strong' and 'developing' categories) has been set at 'a reasonable expectation of student achievement at the time of testing'.²⁵ Students who fall short of this benchmark may have gaps in their foundational knowledge and skills, making it harder for them to keep up with grade-level learning expectations over time. Unless these gaps are closed quickly, students are likely to find it increasingly hard to catch up to their peers.

At the time of writing, national and state-level NAPLAN data for 2023 are not available publicly. However, ACARA has suggested that about 30 per cent of Australian students in 2022 would have fallen short of the

new proficiency benchmark.²⁶ This suggests the new benchmark is a more robust and educationally meaningful measure of how Australian students are faring than the old NAPLAN 'national minimum standard', which was set far too low and mis-identified too many struggling students as on track with their learning.²⁷

The new NAPLAN proficiency benchmark also appears to align more closely with Australia's performance against our national proficiency benchmarks for the PISA, TIMSS, and PIRLS assessments, which are described as being set at a 'reasonable but challenging' level.²⁸

Australia's governments should set a long-term goal of ensuring that at least 90 per cent of students meet this new proficiency benchmark in reading and numeracy in Years 3, 5, 7, and 9.²⁹ Students who meet the 'reasonable expectation' of achievement at each of these year levels are more likely to remain on track with their learning over time, as academic demands increase. Proficiency in reading and numeracy are also core foundations for success in a wide range of subjects and in life beyond school.

An ambitious but realistic intermediate target would be for each state and territory to lift the proportion of their students who meet the new NAPLAN proficient benchmark in reading and numeracy (that is, they perform in the 'strong' or 'exceeding' category) by at least 10 percentage points between now and 2033.³⁰ Structuring a target in

24. According to statements by the Australian Curriculum, Assessment, and Reporting Authority (ACARA) about the new benchmarks: Australian Curriculum, Assessment and Reporting Authority (2023).

25. Australian Curriculum, Assessment and Reporting Authority (ibid). ACARA noted that the new achievement levels are set using the professional judgment of panels of expert teachers.

26. Carroll and Carey (2023).

27. Australian Curriculum, Assessment and Reporting Authority (2023).

28. For example, the proportion of Australian students failing to meet the proficiency benchmark for reading in PIRLS is 20 per cent, and 41 per cent in PISA, compared to 4-to-10 per cent of Australian students not meeting the national minimum standard for reading in NAPLAN. See further in Hillman et al (2023, p. xvii).

29. This acknowledges that some students may not be able to reach proficiency due to, for example, acute learning disabilities. See Hempenstall (2013, p. 28).

30. Note that the Productivity Commission said that, 'The next school reform agreement should include firm targets for improving academic achievement for

this way would ensure that the target set for each state accounts for their different starting points. In the next NSRA, this target should be pro-rated for the term of the agreement (for example, a target of a 5 percentage point improvement over five years, if that is the term of the next agreement).

Australia should also ensure it is stretching its high-achieving students (those in the new ‘exceeding’ category) and improving the performance of disadvantaged students. Progress for these groups should also be tracked in public reporting against the NSRA targets and reforms (see further in Chapter 6).

Recommendation 1

- (a) Australia’s governments should commit to a long-term goal that 90 per cent of students should reach proficiency in reading and numeracy, as measured by the proportion of students in the ‘strong’ or ‘exceeding’ category in NAPLAN in Years 3, 5, 7, and 9.
- (b) As an interim target, each state and territory should commit to an uplift of 10 percentage points over the next 10 years, based on NAPLAN performance in 2023, pro-rated for the term of the next NSRA.

1.2 Mandate a national phonics check

Universal screening is the most effective and cost-efficient way to ensure any student at risk of falling behind in their learning is identified early and given the help they need to catch up.

all students, including students from priority equity cohorts, in each jurisdiction’: Productivity Commission (2023).

A student’s ability to accurately decode words is a strong predictor of their future reading achievement.³¹ It is critical that students who struggle with word decoding in the first few years of school are identified early and provided with additional learning opportunities, such as targeted instruction. If these students still do not progress, additional screening might be necessary to identify whether they have an underlying learning difficulty or disability.

In Australia, there is no national measure of reading performance until Year 3 (via NAPLAN), by which time most students should already be well on their way from ‘learning to read’ to ‘reading to learn’.

Australia should mandate a universal Year 1 phonics check, to assesses students’ decoding skills (using knowledge of phonics) across 40 words and pseudo-words of increasing complexity.³²

All Year 1 students in all schools – government, Catholic, and independent – should be screened. All schools should use the Australian Government Phonics Check, which is freely available, accurate, and efficient. It only takes about seven minutes to administer one-on-one with a teacher.³³

A universal Year 1 phonics check would ensure that Australia has a national picture of student progress towards reading proficiency before the Year 3 NAPLAN assessment.³⁴ Students who do not meet the ‘expected level’ in Year 1 should be re-assessed in Year 2. Aggregate state-wide results should be publicly released, with sector and cohort breakdowns to assist with the identification of best practice.

31. Castles et al (2018); and Machin et al (2016).

32. Phonics is understanding the connection between individual sounds of spoken language (phonemes) and letters (graphemes) that represent those sounds: Education Endowment Foundation (2021).

33. Department of Education (2023b).

34. Department of Education (2023c).

Well designed and conducted, the check would be a powerful early screener of reading performance among Australian students. A UK study found that results on its Year 1 universal phonics check are highly correlated to later student performance in PIRLS in Year 4.³⁵

A nationally consistent Year 1 phonics check would provide a useful 'health check' on early reading performance across Australia's multiple school systems and provide governments with robust information on where additional support for schools and teachers is needed. It would also help schools to identify and support struggling readers early.

Australia's governments should set a target of at least 90 per cent of students achieving the 'expected level' by Year 2, with appropriate interim targets established once baseline data are collected. England has been able to hit 90 per cent by Year 2, so Australia should be able to do the same.³⁶

Recommendation 2

Australia's governments should commit to:

- (a) A nationally consistent, mandatory Year 1 Phonics Check for all students and a re-sit process for Year 2 students who do not meet proficiency benchmarks.
- (b) A goal of 90 per cent of all students reaching proficiency in the Phonics Check by Year 2, with appropriate interim targets established once baseline data are collected.

35. Machin et al (2016).

36. UK Department of Education (2022a).

2 Invest in practical reforms to lift student performance

Australia needs a practical reform agenda that ensures evidence-based practice is the norm – consistently – in all classrooms. Targets are not enough on their own.

To bridge the evidence-to-practice gap, governments should:

- develop detailed, evidence-based practice guidance for schools,
- ensure schools have access to the high-quality resources they need to teach effectively, including curriculum materials and assessments,
- invest in building teacher expertise in evidence-based practices,
- support schools to establish an effective multi-tiered system of support (MTSS) framework to meet the wide range of student needs in the typical school, including small-group tutoring to help struggling students catch up.

Working in concert, these reforms would lift equity and excellence in student performance, while also strengthening the teaching profession.

This chapter outlines the reforms needed to get there.

2.1 Develop detailed, evidence-based practice guidelines

Translating evidence about effective teaching into concrete teaching practice, reliably, across all classrooms in Australia would be no small feat.

To increase the odds that research evidence makes it to the classroom, governments should establish a transparent process for evaluating evidence, and identifying what practices are most effective and how these should be implemented in the classroom. Leaving it to chance, or

waiting for each school to identify best practice on their own, risks too many students missing out on effective teaching.

Drawing on lessons from healthcare, Australia's education systems should ensure school leaders and teachers have access to practice guidelines that outline the best evidence on powerful teaching strategies and identify the most effective practical materials teachers can use – such as curriculum materials and assessment tools – to boost learning.

2.1.1 We need to close the evidence-to-practice gap

While approaches vary across jurisdictions, Australian governments are still not doing enough to guarantee that all schools and teachers have a clear understanding of the latest research evidence and what it means for their instruction, assessments, and catch-up supports.

Practice guidance is only useful if it helps teachers make better decisions in their classrooms. But in Australia, there are three problems. First, the process of developing practice guidance is not always rigorous, so there is a danger that teachers are given incorrect or outdated advice. Second, the process is not always transparent, which undermines the credibility of practice guidance in the eyes of the profession. Third, practice guidance is often too high-level and does not give teachers sufficient detail about what to do in their classrooms (e.g., by recommending specific assessments).

Reading instruction offers a useful example. Education research continues to develop an increasingly clear picture of best-practice classroom teaching to develop the skills required for reading: word recognition and language comprehension.³⁷

37. See a summary of the latest research in Castles et al (2018).

The Australian Education Research Organisation (AERO) has produced an introduction to the ‘science of reading’.³⁸ But it only provides teachers with a summary of the evidence, and theoretical frameworks for understanding the sub-skills involved. It is a helpful snapshot, but there is still a huge amount of work left for teachers and school leaders to do to implement the frameworks in their school.

Many teachers and school leaders are so stretched they simply do not have the time or deep expertise necessary to fill in all the gaps, such as determining which specific teaching activities, curriculum materials, or assessments best align with the evidence.

2.1.2 Practice guidelines help translate evidence into action

Like education, the health sector grapples with how to translate large volumes of research evidence into everyday practice. The evidence-based medicine (EBM) movement in the 1990s saw the development of clinical practice guidelines and protocols that help clinicians align their practice to the best evidence (see Box 1).³⁹

In healthcare, teams of expert researchers follow a systematic process to develop guidance that supports the work of healthcare staff and helps them make sound clinical decisions. Well-designed guidelines and protocols also recognise the limits of research evidence by bringing together research evidence, clinical experience, and patient preferences.⁴⁰

In Australia, healthcare practice guidelines are developed by government bodies, such as the National Health and Medical Research Council (NHMRC). Others are developed by professional associations, such as the Royal Australian College of General Practitioners, or

38. Australian Education and Research Organisation (2023a).

39. Venus and Jamrozik (2020).

40. Masic et al (2008).

advocacy groups, such as the Cancer Council, Stroke Foundation, and Heart Foundation.

The NHMRC approves guidelines if they meet the required standards, have been the subject of public consultation, and have been independently reviewed.⁴¹ The approval lasts for five years.

Healthcare practice guidance is thorough and detailed. For example, guidelines and protocols may advise on which diagnostic or screening tests to order, how to provide certain medical services, and how long patients should stay in hospital. They can also include written step-by-step plans for specific procedures.⁴²

2.1.3 Develop evidence-based practice guidance

There is no way a doctor can stay on top of all the emerging research evidence in their field. Neither can teachers. But Australia’s education system does not currently have evidence-based guidelines like those in healthcare.

The US government produces evidence-based guidelines for teachers and school leaders on a range of topics (see Box 2). For example, practice guides have been developed on supporting foundational reading skills and comprehension, assisting students struggling with reading and maths, and providing intervention supports.⁴³

Australian governments should commit to a nationally consistent process for developing robust practice guidelines, with the support of AERO, Australia’s national education evidence institute.

41. National Health and Medical Research Council (2016).

42. A protocol is a written plan that specifies procedures to be followed in defined situations. Clinical pathways incorporate clinical guidelines and protocols into clinical processes of care. See further in Hewitt-Taylor (2004) and Rotter et al (2019).

43. US Institute of Education Sciences (2023).

The practice guidelines should be developed through a rigorous and transparent process. They should be informed by an expert panel, including researchers and practitioners; transparent about the development process; manage potential conflicts of interest; up-to-date and regularly reviewed.

The guidelines should include an implementation plan and also be:

- informed by a robust literature review
- linked to an evidence grade in a clear evidence hierarchy
- communicated in a practical way
- linked to practical materials, such as off-the-shelf assessment schedules or catch-up tutoring protocols, where relevant
- linked to concrete curriculum materials and assessment tools that teachers can use

Practice guidelines should be developed first in areas of greatest need and where the research evidence is the most robust, such as reading and numeracy instruction and intervention.

The guidelines should be used to focus further investments in curriculum materials, assessments, and professional development, and should inform school review processes.

Of course, merely publishing practice guidelines is not enough on its own to shift practice. There is a lot that education systems can learn from the experience of the health sector, which has significantly increased the understanding of 'implementation science' and the provision of evidence-based healthcare over the past 30 years.⁴⁴

44. See for example, Braithwaite et al (2014).

Box 1: Practice guidelines improve patient outcomes

Practice guidelines are a key part of healthcare service delivery across the globe. They are integrated into hospital processes and clinical practices.

Research evidence shows that guidelines and protocols improve patient outcomes and even reduce costs.^a For example, a 2010 review found that clinical care pathways reduced in-hospital complications – such as wound infections, bleeding, and pneumonia – by 40 per cent, and improved documentation.^b

A 2010 US review noted that protocols improved patient outcomes during labour in hospitals.^c The Hospital Corporation of America developed protocols for birth procedures, including for the use of oxytocin administration during vaginal birth. This included mandatory online training. Patient outcomes improved (for example, the caesarean delivery rate dropped) and there was a 50 per cent reduction in professional liability claims.

a. Setkowski et al (2021); Kirkpatrick and Burkman (2010); and Rotter et al (2010).

b. Rotter et al (2010).

c. Kirkpatrick and Burkman (2010).

Recommendation 3

The NSRA should commit Australian governments to developing nationally consistent teaching practice guidelines through a process led by AERO.

2.2 Provide access to high-quality, comprehensive, knowledge-rich curriculum materials

The Consultation Paper emphasises the importance of a whole-school approach to curriculum planning and delivery, to ‘give students the best chance of developing deep knowledge and skills mastery over time’.⁴⁵

Schools need more support to implement this in practice. Grattan Institute research has found that governments have dramatically underestimated how much support teachers and school leaders need to get curriculum planning right.⁴⁶

A coordinated, whole-school approach enables teachers and support staff to collectively implement a tiered support model, with high-quality, universal, whole-class instruction (Tier 1), and more intensive support for students who need it (Tiers 2 and 3).

With agreement about what students should learn in each year level and subject, teachers can better respond to the range of student abilities in their class and can draw on other teachers or support staff to target small-group or one-on-one tutoring to specific student needs.

A 2022 Grattan Institute survey of 2,243 teachers and school leaders showed that a whole-school approach to curriculum planning is the exception in Australia, not the rule. Half of teachers in Australia are

45. Department of Education (2023a, p. 18).

46. Hunter et al (2022).

Box 2: The US produces detailed education practice guidelines

The US Institute of Education Sciences (IES) – an independent research body for the US Department of Education – publishes evidence-based practice guides, including on reading instruction and intervention.^a

The IES oversees the guideline development process. Topics are chosen in areas where there is sufficient research to make recommendations. The institute works with research organisations to develop guidelines, drawing on the advice of expert panellists, including researchers and practitioners. A research protocol is developed, followed by a literature review, which informs the draft recommendations. The protocol is then reviewed by the expert panel. This process takes about two years.

Each recommendation is rated against an established evidence hierarchy. Guidelines also include specific steps teachers can take to implement each recommendation, clear advice on what practices are not aligned with the evidence, how to overcome potential implementation challenges, and a summary of the research literature.

To ensure transparency, information is also provided about the guideline development process, expert panellists and staff, disclosures of conflicts of interest, and the rationale for evidence grades.

a. US Institute of Education Sciences (2023).

planning their classes on their own.⁴⁷ Only 15 per cent of teachers have access to a shared bank of high-quality curriculum materials for all their classes, and this is even less likely for teachers in disadvantaged schools. This is deeply troubling, because high-quality curriculum materials are essential to building students' vocabulary and background knowledge across a wide range of subjects.

Governments should do much more to make it easier for schools and teachers to identify and access high-quality materials and programs that are aligned with evidence-based teaching approaches.

2.2.1 Invest in high-quality curriculum materials

Having access to comprehensive high-quality curriculum materials for all subjects makes a big difference. Grattan Institute's research has shown that teachers are much more likely to report consistent learning by students in different classrooms, a shared understanding with colleagues of what constitutes effective teaching, and greater satisfaction with their school's planning approach.⁴⁸

The workload benefits for teachers are big too – teachers spend about three hours less each week sourcing and creating materials when they have access to high-quality shared resources for all of their subjects. Helping schools to access shared materials could save 20 million teacher hours a year.⁴⁹

Grattan Institute recommends a new partnership between governments, principals, and teachers, in which governments and sector leaders acknowledge the heavy lifting involved in curriculum planning and provide schools and teachers with clearer guidance and more practical support to help all schools implement a whole-school curriculum approach.

47. Ibid.

48. Ibid.

49. Ibid.

Governments should audit available high-quality, comprehensive curriculum materials in Australia – focusing on subject-specific materials that are fully-sequenced across year levels and include detailed lesson-level materials along with student assessments, workbooks, and teacher guides – and invest to fill gaps.

Governments should seek to make a wide range of high-quality options available, so schools have choice about what would work best for their students in their context.

Governments should not necessarily seek to develop materials 'in-house'. Governments could look to commission new materials from not-for-profits (including subject associations) and commercial providers, or provide incentives for providers to raise the quality or comprehensiveness of existing materials.

Comprehensive curriculum materials should be road-tested in classrooms before they are made widely available.

Curriculum materials should also be readily available to all schools, whether government, Catholic, or independent. Too often, materials developed in one jurisdiction have been inaccessible to teachers in other jurisdictions. In the next NSRA, the federal, state, and territory governments should commit to sharing high-quality curriculum materials across sectors and nation-wide.

2.2.2 Ensure curriculum materials are quality-assured

High-quality curriculum materials are hard to find – the internet is awash with one-off activities and worksheets, but there is not a lot of detail about high-quality, comprehensive, logically sequenced resources that are aligned to the mandated curriculum.

Governments should make the right choice the easy choice, by establishing a rigorous and independent quality-assurance mechanism that can be used to evaluate the quality of curriculum materials.

Quality-assurance findings against a transparent set of criteria should be made public.

Grattan Institute recommends Australian governments look to EdReports, an independent not-for-profit organisation in the US, to help devise a national quality-assurance model.

EdReports quality assures comprehensive curriculum materials developed or funded by commercial and not-for-profit organisations and government, and publishes the results on its website. Its quality reviews are thorough. Trained teams of reviewers spend four-to-six months reviewing each set of materials. They evaluate materials against detailed and evidence-based criteria on quality and usability in the classroom.

The criteria for reviewing early years literacy curriculum materials are set out in a 100-page guide, which helps reviewers assess whether materials meet requirements such as providing systematic and repeated instruction for students to hear, say, and read every new sound-letter combination they learn, for example.⁵⁰

EdReports has had a significant impact on the quality of curriculum materials available to American teachers. Across 42 different publishers, 87 sets of curriculum materials have been changed based on EdReports reviews.⁵¹ Currently 29 state education departments use EdReports reviews for state plans, policy, and advice to teachers and school leaders.

This model could work in Australia's federal system. EdReports works across different US states, some of which follow the same 'Common Core' State Standards and some which do not. EdReports works directly with states that follow different standards, adapting its review

process to help states identify high-quality materials that meet their own state-specific curriculum requirements.

Australian governments should commit to contributing funding to a genuinely independent body, similar to EdReports, to quality assure curriculum materials. Australian governments should also commit to ensuring that any comprehensive curriculum materials they develop or commission are also submitted to the new body, for independent quality-assurance. The body could be funded by a one-off endowment from the Australian Government.

The case for national support is strong. Most Australian states and territories follow the Australian Curriculum, and smaller states and territories have less capacity to fund this work themselves.

Recommendation 4

Australia's governments should ensure that all teachers have access to quality-assured comprehensive curriculum materials for all subjects and year levels, including detailed lesson-level materials along with student assessments, workbooks, and teacher guidance. Governments should:

- (a) Audit the existing comprehensive curriculum materials that are currently available to schools, and identify critical gaps
- (b) Invest in comprehensive curriculum materials to fill gaps, and support teachers to use them effectively
- (c) Establish a rigorous, independent quality-assurance mechanism, similar to EdReports, to continually evaluate and report on the quality of comprehensive curriculum materials available to schools.

50. For further detail see Hunter et al (2022, Box 19).

51. Hirsch (2023).

2.3 Build teacher expertise

The Consultation Paper rightly identifies that ‘teaching is a specialist profession requiring high-quality training and development’.⁵² Effective teacher training is critical to ensuring all teachers are well prepared for the classroom and can best support the learning needs of a diverse range of children. Current pre-service and in-service teacher training in Australia is not adequately preparing teachers for effective teaching. And it is not developing sufficient numbers of teachers with specialist expertise.⁵³

The 2023 Teacher Education Expert Panel’s final report recommended reforms to strengthen the quality of Initial Teacher Education (ITE) programs, such as mandating core course content.⁵⁴ While these reforms are an important step to improving teacher expertise, there also needs to be a mechanism through which in-service teachers – who make up the vast majority of the workforce – are also upskilled. The need is particularly urgent for the one-in-four secondary teachers who are currently teaching ‘out-of-field’.⁵⁵

In-service professional development is also key to improving student performance.⁵⁶ There is robust literature that shows that well-targeted investment in in-service professional development increases teacher knowledge and skills, which changes classroom instruction and improves student learning.⁵⁷

52. Department of Education (2023a, p. 28).

53. For example, a 2021 federal government review of Initial Teacher Education (ITE) found that ITE courses in Australia do not adequately prepare graduates to teach reading: Department of Education, Skills and Employment (2022).

54. Department of Education (2023d). Education Ministers gave in-principle agreement to the Panel’s recommendations.

55. This is the best estimate available: Australian Institute for Teaching and School Leadership (2023).

56. Sims et al (2021).

57. Desimone (2009); and Egert et al (2018).

But ensuring all teachers have the knowledge and skills they need across the subjects they teach is a huge task. For example, to upskill teachers in the evidence on how best to teach reading, Mississippi fully funds a two-year, 160-hour reading instruction course for all early years teachers.⁵⁸

Australian governments should fund additional training in evidence-based instruction, including in practice guides and assessment. Professional development courses should not qualify for funding unless they have been quality-assured.

As a first step, Australian governments should invest in developing micro-credentials for evidence-based reading and numeracy instruction and provide incentive payments to schools that employ teachers with the certification.⁵⁹

High-quality micro-credentials are an effective way to up-skill teachers and school leaders.⁶⁰ The UK has a suite of micro-credentials called National Professional Qualifications. One example is the ‘National Professional Qualification in Leading Literacy’, which is aimed at teachers who are aspiring to lead reading instruction across a school. It is a fully funded 12-month program, with a mix of face-to-face and online learning for one-to-two hours a week. The training is provided by accredited schools and intermediaries, such as the English Hubs,⁶¹ and must meet targets set by the UK Department of Education. Schools receive £200 for every teacher who has completed a National Professional Qualification.

58. Folsom et al (2017).

59. The federal government has recently invested in a micro-credential on phonics, but more work needs to be done to build a suite of micro-credentials that have different levels of specialisation and coverage.

60. Tamoliune et al (2022).

61. For example, United Learning is a group of schools in the UK which offers the training: <https://centrallondontsh.org.uk/programmes/npqs>.

National Professional Qualifications are subject to ongoing quality-assurance. Trained reviewers visit a qualification's lead provider at least once every two years. The quality assurance process is rigorous and involves a team of reviewers gathering evidence across four days. The team interviews and surveys trainers and participants, reviews documentation (such as the training program and training materials), and sits in on training sessions. After the visit, reviewers synthesise evidence collected against a quality framework, and use this to grade the qualification. Grades and reports are made public, so schools and teachers know where to go for high-quality professional development.⁶²

Recommendation 5

Australian governments should develop and fund quality-assured micro-credentials in evidence-based reading and numeracy instruction, and provide incentive payments to schools that employ teachers with the certification.

2.4 Embed a multi-tiered system of support in all schools

Targeted interventions for students can be effective in boosting learning, particularly small-group or one-to-one tuition for students who have fallen behind. A review of the global evidence showed that small-group tuition can boost student learning by as much as four months, on average, over the course of a year.⁶³

High-quality small-group tuition is best delivered through a systematic 'multi-tiered system of support' (MTSS) model in schools, which comprises an integrated set of practices and interventions to support improved academic results and student behaviour.⁶⁴ As part of this

model, all students receive high-quality classroom instruction ('Tier 1'), some students who need more support also receive targeted additional teaching 'doses' for short periods ('Tier 2'), and a small number of students receive more intensive, individualised support ('Tier 3').⁶⁵

Grattan Institute's recent report, *Tackling under-achievement: Why Australia should embed high-quality small-group tuition in schools*,⁶⁶ shows that when delivered through a multi-tiered system of support, catch-up tutoring can help reduce learning disparities, including equity gaps. In most cases, small-group tuition ('Tier 2') or one-on-one tuition ('Tier 3') should provide an additional dose of instruction that supports work done in the classroom, rather than be a substitute for classroom teaching.

Success depends on how well Tier 1 classroom teaching programs and Tier 2 and Tier 3 interventions are designed and implemented. Not all schools have best-practice classroom instruction firmly in place, or use small-group or one-on-one interventions that are evidenced-based or well-targeted to student needs. Workforce shortages can also be an impediment.

Australia's governments should investigate ways in which small-group catch-up tuition can be embedded in strong MTSS models in schools, to tackle persistent and significant learning gaps.

COVID catch-up tuition was designed to help struggling students after periods of remote schooling. It has been used in Australia, the UK, the US, and beyond. This period of innovation has created a lot of evidence about how well schools are equipped to deliver small-group tuition, including the barriers schools face and the extra supports they need. For example, evidence from the UK shows that teaching assistants can deliver impressive student learning results under the right conditions.

62. Ofsted (2022).

63. Evidence for Learning (2021).

64. Sailor et al (2021).

65. Hunter and Sonnemann (2023, p. 10).

66. Ibid.

Australia's governments should also give schools better guidance and training on the use of high-quality student diagnostic assessments and effective instructional materials and intervention programs that build foundational skills.

Recommendation 6

Australian governments should commit to embedding a multi-tiered system of support (MTSS) model, including high-quality small-group tuition for students who require catch-up support, in all schools over the term of the next NSRA agreement. To support this, governments should:

- (a) give schools clearer guidance on how to embed high-quality small-group tuition for catch-up support in literacy and numeracy (through detailed practice guidelines on effective interventions, as outlined in Section 2.1)
- (b) invest in rigorous trials and evaluations to refine best-practice guidelines and support, and cost-effective staffing models.

3 Improve student mental health and wellbeing

This chapter discusses key issues relating to student wellbeing raised in the Consultation Paper and considers how the next NSRA can seek to address them.

3.1 Schools should focus on creating safe learning environments

The Consultation Paper recognises that schools are a ‘key environment beyond the home for nearly all Australian children’.⁶⁷ This means that experience at school ‘can be either a risk factor or protective factor for a child’s mental health’.⁶⁸

Students’ sense of belonging at school shapes their emotions, behaviour, and engagement, which also influence their academic performance.⁶⁹ This is particularly important for students from lower socio-economic backgrounds, who often have a weaker sense of belonging to school.⁷⁰

Schools can promote a sense of belonging by fostering positive relationships, minimising bullying, and implementing school-wide behaviour management strategies, routines, and supports.⁷¹ Without these strategies, schools can struggle to manage poor behaviour.⁷²

Australia has more work to do here. Australian students find their classes considerably more disruptive than students in other OECD

countries. In 2018, Australia ranked 69 out of the 76 economies surveyed for the OECD’s index of disciplinary climate.⁷³

Australia’s disruptive classrooms are concerning for students and teachers. Students report feeling more engaged with their learning when they feel teachers care about them and are in control of the classroom.⁷⁴ And poor student behaviour is a key reason why a quarter of Australian teachers report feeling unsafe at work.⁷⁵

3.1.1 To improve student wellbeing, schools should also focus on closing learning gaps

Grattan Institute agrees with the expert panel’s view that ‘learning and wellbeing are inextricably linked’ in a ‘virtuous cycle’.⁷⁶

Promoting student wellbeing and academic achievement should not be seen as a trade-off.⁷⁷ When students develop a sense that they are succeeding academically, it boosts their self-esteem.⁷⁸ This makes students’ mastery over learning an important protective factor for their wellbeing.⁷⁹

The reverse is also true. The expert panel rightly notes that ‘students who struggle significantly with learning gaps that are not addressed can

67. Department of Education (2023a, p. 22).

68. *Ibid* (p. 22).

69. Australian Education and Research Organisation (2023b).

70. Centre for Education Statistics and Evaluation (2020, Figure 2 on p. 4).

71. Australian Education and Research Organisation (2023b); Shoefel et al (2020); and Centre for Education Statistics and Evaluation (2020).

72. Australian Education and Research Organisation (2021).

73. This index is based on students’ responses to questions such as how often ‘Students don’t listen to what the teacher says’, or that ‘The teacher has to wait a long time for students to quieten down’. See Table III.B1.3.1, Organisation for Economic Co-operation and Development (2019, pp. 262–263)

74. Uden et al (2014).

75. Longmuir et al (2022).

76. Department of Education (2023a, p. 21).

77. Clarke (2020).

78. Cahill et al (2014).

79. *Ibid*.

face declining mental health outcomes, which in turn can undermine future learning'.⁸⁰ Being unable to grasp content, and follow an explanation, can damage students' perception of their competence and self-worth.⁸¹

This is why effective teaching matters for students' wellbeing and resilience.⁸² The reciprocal relationship between academic achievement and wellbeing means that schools can significantly contribute to students' wellbeing by excelling in the core business of teaching and learning.⁸³

3.1.2 Schools need greater support to partner with health and social services

The expert panel's Consultation Paper highlights that, while schools can play an important role in creating safe and inclusive environments that promote good mental health and wellbeing, 'there are many aspects of student mental health and wellbeing that need to be addressed outside the school gates'.⁸⁴

We agree. Schools should not – and cannot – be solely responsible for the mental health and wellbeing of students. If Australia places this expectation on schools, it risks stretching the role of teachers and school leaders beyond both their expertise and their capacity.

Addressing students' wellbeing requires schools to work in partnership with health and social service providers. As the Consultation Paper notes, schools are uniquely placed to identify and refer students who require further support. To do this, teachers and school leaders need better access to a health and social services sector that integrates

more effectively with schools and provides students with the mental health care and support they need.

3.1.3 Governments should create a national survey on school climate, disruption, student wellbeing, and belonging

The next NSRA should include a commitment to create a national survey on school climate, classroom disruption, student wellbeing, and student sense of belonging. The survey could accompany the annual NAPLAN assessments in Years 3, 5, 7, and 9.

A reliable national dataset would enable Australian governments, schools, and researchers to track changes in school climate and student belonging, and provide greater insight into the effectiveness of different practices and interventions.

The survey should ask students' about their sense of safety and belonging at school, their wellbeing, their school's climate, and behaviour or disruption at their school. Questions could be adopted from existing surveys in Australia,⁸⁵ and the OECD's PISA survey. Australia's governments could also draw on England's National Behaviour Survey (see Box 3). Questions may differ between primary and secondary schools.

All schools, including Catholic and independent schools, should do the survey, and the results should be made public. Governments should ensure survey results can be linked to NAPLAN data, so that researchers can investigate potential connections, such as between classroom disruption and student academic performance.

80. Department of Education (2023a, p. 21).

81. O'Connell et al (2009).

82. Lera et al (2022).

83. Quinn and Duckworth (2007); and Kleinkorres et al (2020).

84. Department of Education (2023a, p. 22).

85. For example, Victoria's Student Attitudes to School survey or NSW's Tell Them From Me survey.

Box 3: Australia could draw on England's National Behaviour Survey

England introduced the National Behaviour Survey in 2021 to 'better understand what parents, children, teachers, and leaders think of behaviour and wellbeing in their school'.^a The survey collects student wellbeing and behaviour data each term from a representative sample of pupils, school leaders, teachers, and parents.^b

Survey questions include:

- To what extent do you feel that there is an adult at school who really cares about you?
- Thinking about the past week, how often, if at all, did misbehaviour of other pupils stop or interrupt the lesson or you doing your work?
- What, if anything, has made you feel worried, anxious, or depressed in the last two weeks?
 - Getting good grades in exams
 - School work
 - Mental health
 - Making and maintaining friendships
 - Applying for the next stage of education
 - Other pupils' behaviour at school
 - Bullying
 - Problems at home
 - Coping with learning difficulties or special education needs and/or disability

a. UK Department of Education (2022b, p. 31).

b. UK Department for Education (2023).

Recommendation 7

Australian governments should create a national student survey to track data on school climate, disruption, and student wellbeing and sense of belonging, to be filled out annually by Year 3, 5, 7, and 9 students as part of NAPLAN.

4 Attract and retain teachers

To attract and retain more teachers, and boost the productivity of the existing workforce, Australia's governments should create new expert teacher career paths, and implement reforms that give teachers more time to focus on effective teaching.

4.1 Create new expert teacher career paths

Teacher career paths in Australia should be reformed to enable our top teachers to provide more instructional leadership in schools.

Grattan Institute's 2020 report, *Top teachers: Sharing expertise to improve teaching*, recommends that governments create two new permanent positions – Instructional Specialists and Master Teachers – to enable our best teachers to lead professional learning in schools.⁸⁶ These roles would be designed for subject-specific expert teachers who have recognised skills and dedicated responsibilities to work with classroom teachers to spread quality practice.

Instructional Specialists would work within schools to set the standard for good teaching, build teaching capacity, and spread evidence-informed practices. Central to these roles would be frequent opportunities to demonstrate practice and to observe and coach other teachers. These roles should be specific to subject area and stage, for example 'primary numeracy', 'secondary literacy', or a specific subject domain such as Science. They should be paid about \$40,000 more than the highest standard pay rate for teachers. The position would be limited to about 8 per cent of teachers.

Master Teachers would be responsible for improving teaching across multiple schools by coordinating professional learning, supporting Instructional Specialists, and connecting schools with research. They

would be charged with bringing rigor and coherence to professional judgments about best practice, and act as a system-level broker, facilitating learning between researchers, system leaders, schools, and teachers. With pay set at about \$80,000 more than the highest standard pay rate for teachers, the position should be limited to about 1 per cent of teachers.

Through the NSRA, Australia's governments should commit to creating these new expert teacher career paths in stages. The first stage should involve pilot programs across several regions to refine the optimal role description and approach to training, recruitment and oversight, ideally building on the existing HALT accreditation process.

Recommendation 8

Australia's governments should commit to creating an expert career path in each state and territory. This should include new subject-specific Master Teachers and Instructional specialist roles.

Australia's governments should commit the Australian Institute for Teaching and School Leadership (AITSL) to:

- (a) Updating the Australian Professional Standards for Teachers, to include new, detailed, subject-specific teacher elaborations that articulate the content and skills teachers need for effective teaching in each subject area and for certain year levels (e.g., the early primary years).
- (b) Updating HALT (Highly Accomplished and Lead Teachers) accreditation processes to encourage subject specialisation.

86. Goss and Sonneman (2020).

5 Increase investment in research and innovation

Grattan Institute's research on school improvement, teacher workload, the wider school-workforce, and curriculum planning has identified a range of reforms that would enable schools to better meet the needs of students.

Governments should adopt a more rigorous approach to exploring more effective school operational models, and the implications for the wider schools' workforce. We recommend that Australia's governments increase investment in education research and development, through a process of 'disciplined innovation', trialling and testing new ways of working that make more time for great teaching and boost student performance, in collaboration with AERO.

Australia's governments should also establish an independent agency charged with conducting a thorough review of the adequacy of the wider school-workforce to meet Australia's Mparntwe Education Declaration goals, and to investigate and make recommendations on issues such as:

- building a stronger workforce 'pipeline' to ensure jurisdictions, sectors, and schools can source the wider schools' workforce they need to meet Australia's Mparntwe Declaration goals
- strategies to boost the quality, training, and productivity of the existing schools' workforce
- best practice 'scope of work' for different types of staff in schools (such as school principals, teachers, teaching assistants, administrative staff, and allied health staff), and how these staff can best work together
- strategies to increase the diversity of the wider schools' workforce, with a focus on boosting the number of First Nations teachers.

Recommendation 9

- (a) Australian governments should commit to increased investment in 'disciplined innovation' to test new school operational models and ways of working that boost student outcomes. New approaches should be subject to robust independent and publicly reported evaluation, including randomised control trials where appropriate.
- (b) Australian governments should also establish a new independent agency charged with conducting a thorough review of the adequacy of the wider schools' workforce to meet Australia's Mparntwe Education Declaration goals, and make recommendations to strengthen the effectiveness and productivity of the wider workforce.

6 Report on progress

Australian governments should track their progress on targets and reforms.

As recommended by the Productivity Commission's review of the NSRA, a stand-alone annual report should be tabled in Federal Parliament that tracks progress against specific targets and reforms, to create greater accountability through transparency.⁸⁷

The annual report should include both state and sector analysis of performance, as appropriate, as well as performance for student cohorts of interest. This would boost accountability for student performance.

Recommendation 10

Australian governments should report on progress on targets and reforms, through an stand-alone annual report tabled in Federal Parliament.

87. Department of Education (2023a, pp. 276–277).

Bibliography

- Australian Curriculum, Assessment and Reporting Authority (2023). “New proficiency standards for NAPLAN”.
<https://www.acara.edu.au/docs/default-source/media-releases/naplan-proficiency-standards-media-release-2023-02-10.pdf>.
- Australian Education and Research Organisation (2021). *Focused classrooms: Managing the classroom to maximise learning*.
<https://www.edresearch.edu.au/sites/default/files/2021-03/AERO-Tried-and-tested-guide-Focused-classrooms.pdf>.
- (2023a). *Introduction to the science of reading*.
<https://www.edresearch.edu.au/resources/introduction-science-reading>.
- (2023b). *Encouraging a sense of belonging and connectedness in primary schools*. <https://www.edresearch.edu.au/resources/encouraging-sense-belonging-and-connectedness-primary-schools>.
- Australian Institute for Teaching and School Leadership (2023). *ATWD National Trends: Teacher Workforce*. <https://www.aitsl.edu.au/research/australian-teacher-workforce-data/atwdreports/national-trends-teacher-workforce>.
- Boyd, T. (2021). “Education Reform in Ontario: Building Capacity Through Collaboration”. *Implementing Deeper Learning and 21st Century Education Reforms: Building an Education Renaissance After a Global Pandemic*. Ed. by F. M. Reimers. Springer. Chap. Chapter 2, pp. 39–58.
https://link.springer.com/chapter/10.1007/978-3-030-57039-2_2.
- Braithwaite et al (2014). Braithwaite, J., Marks, D. and Taylor, N. “Harnessing implementation science to improve care quality and patient safety: a systematic review of targeted literature”. *International Journal for Quality in Health Care* 26.3.
<https://academic.oup.com/intqhc/article/26/3/321/1792993?login=true>.
- Cahill et al (2014). Cahill, H., Beadle, S., Farrelly, A., Forster, R. and Smith, K. *Building resilience in children and young people: A literature review for the Department of Education and Early Childhood Development (DEECD)*. Youth Research Centre, Melbourne Graduate School of Education.
<https://doi.org/10.26180/21212891>.
- Carroll, L. and Carey, A. (2023). “NAPLAN starts this week. Here's what the changes mean for students and parents”.
<https://www.theage.com.au/national/victoria/naplan-starts-this-week-here-s-what-the-changes-mean-for-students-and-parents-20230312-p5crfr.html>.
- Castles et al (2018). Castles, A., Rastle, K. and Nation, K. “Ending the Reading Wars: Reading Acquisition From Novice to Expert”. *Psychological Science in the Public Interest* 19.1, pp. 5–51.
<https://journals.sagepub.com/doi/10.1177/1529100618772271>.
- Centre for Education Statistics and Evaluation (2020). *Supporting students' sense of belonging: Every student is known, valued and cared for in our schools*. NSW Department of Education.
<https://www.edresearch.edu.au/resources/encouraging-sense-belonging-and-connectedness-primary-schools>.
- Clarke, T. (2020). “Children’s wellbeing and their academic achievement: The dangerous discourse of ‘trade-offs’ in education”. *Theory and Research in Education* 18.3, pp. 263–294. <https://doi.org/10.1177/1477878520980197>.
- Department of Education (2023a). *Review to Inform a Better and Fairer Education System - Consultation Paper*. Australian Government.
<https://www.education.gov.au/review-inform-better-and-fairer-education-system/resources/better-and-fairer-education-system-consultation-paper>.
- (2023b). *Literacy Hub: Year 1 Phonics Check*. Australian Government.
<https://www.literacyhub.edu.au/teach-and-assess/year-1-phonics-check/>.
- (2023c). *Year 1 Phonics Check*. Australian Government.
<https://www.education.gov.au/australian-curriculum/year-1-phonics-check>.
- (2023d). *Strong Beginnings: Report of the Teacher Education Expert Panel*.
<https://www.education.gov.au/quality-initial-teacher-education-review/resources/strong-beginnings-report-teacher-education-expert-panel>.
- Department of Education, Skills and Employment (2022). *Next Steps: Report of the Quality Initial Teacher Education Review*.
<https://www.education.gov.au/quality-initial-teacher-education-review>.

- Department of Health and Aged Care (2023). *Childhood immunisation coverage*. Australian Government.
<https://www.health.gov.au/topics/immunisation/immunisation-data/childhood-immunisation-coverage>.
- Desimone, L. M. (2009). "Improving Impact Studies of Teachers' Professional Development: Toward Better Conceptualizations and Measures". en. *Educational Researcher* 38.3, pp. 181–199. ISSN: 0013-189X, 1935-102X. DOI: 10.3102/0013189X08331140.
<http://journals.sagepub.com/doi/10.3102/0013189X08331140> (visited on 15/03/2023).
- Education Endowment Foundation (2021). *Phonics*.
<https://educationendowmentfoundation.org.uk/education-evidence/teaching-learning-toolkit/phonics#:~:text=Phonics%20is%20an%20approach%20to,phonemes%20to%20read%20written%20language..>
- Egert et al (2018). Egert, F., Fukkink, R. G. and G. A. "Impact of In-Service Professional Development Programs for Early Childhood Teachers on Quality Ratings and Child Outcomes: A Meta-Analysis". *Review of Educational Research* 88.3.
<https://journals.sagepub.com/doi/abs/10.3102/0034654317751918>.
- Evidence for Learning (2021). *Small Group Tuition*. Evidence for Learning.
<https://evidenceforlearning.org.au/education-evidence/teaching-learning-toolkit/small-group-tuition>.
- Faughey, D. (2015). "Learning from successful education reforms in Ontario". *International Education News*.
<https://internationalenews.com/2015/10/28/learning-from-successful-education-reforms-in-ontario/>.
- Folsom et al (2017). Folsom, J. S., Smith, K. G., Burk, K. and Oakley, N. *Educator outcomes associated with implementation of Mississippi's K–3 early literacy professional development initiative*.
<https://files.eric.ed.gov/fulltext/ED573545.pdf>.
- Goss, P. and Sonneman, J. (2020). *Top teachers: Sharing expertise to improve teaching*. Melbourne: Grattan Institute.
<https://grattan.edu.au/wp-content/uploads/2020/02/928-top-teachers.pdf>.
- Hanson, R. A. and Farrell, D. (1995). "The long-term effects on high school seniors of learning to read in kindergarten". *Reading Research Quarterly* 30.4, pp. 908–933.
- Hempenstall, K. (2013). "What is the place for national assessment in the prevention and resolution of reading difficulties?" *Australian Journal of Learning Difficulties* 18.2, pp. 105–121.
<https://www.tandfonline.com/doi/abs/10.1080/19404158.2013.840887>.
- Hewitt-Taylor, J. (2004). "Clinical guidelines and care protocols". *Intensive and Critical Care Nursing* 20.1, pp. 45–52. <https://pubmed.ncbi.nlm.nih.gov/14726253/>.
- Hillman et al (2023). Hillman, K., O'Grady, E., Rodrigues, S., Schmid, M. and Thomson, S. *Australia's results from PIRLS 2021: Progress in International Reading Literacy Study*. Australian Council for Educational Research.
<https://apo.org.au/node/322726>.
- Hirsch, E. (2023). *EdReports 2022 Annual Report*. EdReports.
<https://www.edreports.org/resources/article/edreports-2022-annual-report>.
- Hunter et al (2022). Hunter, J., Haywood, A. and Parkinson, N. *Ending the lesson lottery: How to improve curriculum planning in schools*. Grattan Institute.
<https://grattan.edu.au/report/ending-the-lesson-lottery-how-to-improve-curriculum-planning-in-schools/>.
- Hunter, J. and Sonnemann, J. (2023). *Tackling under-achievement: Why Australia should embed high-quality small-group tuition in schools*. Grattan Institute.
<https://grattan.edu.au/report/tackling-under-achievement/>.
- Ireland Department of Education, R. of and Skills (2011). *Literacy and Numeracy for learning and life: The National Strategy to Improve Literacy and Numeracy among Children and Young People 2011-2020*.
https://curriculumonline.ie/getmedia/f4b76380-9c0c-4543-aa6b-f4e7074597e2/HMP7_Literacy_and_Numeracy_Strategy_English.pdf.
- _____ (2017). *National Strategy: Literacy and Numeracy for learning and life 2011-2020. Interim Review: 2011-2016, New Targets: 2017-2020*.
<https://assets.gov.ie/24960/93c455d4440246cf8a701b9e0b0a2d65.pdf>.
- Kirkpatrick, D. H. and Burkman, R. T. (2010). "Does standardization of care through clinical guidelines improve outcomes and reduce medical liability?" *Obstet Gynecol.* 116.5, pp. 1022–26. <https://pubmed.ncbi.nlm.nih.gov/20966684/>.
- Kleinkorres et al (2020). Kleinkorres, R., Stang, J. and McElvany, N. "A longitudinal analysis of reciprocal relations between students' well-being and academic achievement". *Journal for educational research online* 12.2, pp. 114–165.

- Lera et al (2022). Lera, M.-J., Leon-Perez, J. M. and Ruiz-Zorrilla, P. "Effective Educational Practices and Students' Well-being: The Mediating Role of Students' Self-efficacy". *Current Psychology*. DOI: 10.1007/s12144-022-03266-w.
- Loble, L. (2023). "Australian schools should learn from Mississippi's education revolution". <https://www.afr.com/policy/health-and-education/australian-schools-should-learn-from-mississippi-s-education-revolution-20230712-p5dnqt>.
- Longmuir et al (2022). Longmuir, F., Cordoba, B. G., Phillips, M., Allen, P. K.-A. and Moharami, M. *Australian teachers' perceptions of their work in 2022*. Monash University. <https://doi.org/10.26180/21212891>.
- Machin et al (2016). Machin, S., McNally, S. and Viarengo, M. "Teaching to Teach" Literacy: CEP Discussion Paper No 1425. Centre for Economic Performance. <https://cep.lse.ac.uk/pubs/download/dp1425.pdf>.
- Masic et al (2008). Masic, I., Miokovic, M. and Muhamedagic, B. "Evidence Based Medicine – New Approaches and Challenges". *Acta informatica medica* 16.4, pp. 219–225. <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC3789163/>.
- National Centre for Educational Progress (2022). *Explore Assessment Data*. US Department of Education. <https://nces.ed.gov/nationsreportcard/data/>.
- National Health and Medical Research Council (2016). *2016 NHMRC Standards for Guidelines*. Australian Government. <https://www.nhmrc.gov.au/guidelinesforguidelines/standards>.
- O'Connell et al (2009). O'Connell, M. E., Boat, T. and Warner, K. E. *Preventing Mental, Emotional, and Behavioral Disorders Among Young People: Progress and Possibilities*. ISBN: 978-0-309-12674-8. <http://www.ncbi.nlm.nih.gov/books/NBK32775/>.
- Ofsted (2022). *Guidance: Early career framework and national professional qualification inspection framework and handbook*. <https://www.gov.uk/government/publications/early-career-framework-and-national-professional-qualification-inspection-framework-and-handbook/early-career-framework-and-national-professional-qualification-inspection-framework-and-handbook#full-inspection>.
- Organisation for Economic Co-operation and Development (2019). *PISA 2018 results (Volume III) : What school life means for students' lives*. <https://doi.org/10.1787/19963777>.
- Productivity Commission (2023). *Review of the National School Reform Agreement: Study Report*. Australian Government. <https://www.pc.gov.au/inquiries/completed/school-agreement/report>.
- Quinn, P. and Duckworth, A. (2007). "Happiness and Academic Achievement: Evidence for Reciprocal Causality". *Annual Meeting of the American Psychological Society* 4.
- Rotter et al (2010). Rotter, T., Kinsman, L., James, E., Machotta, A., Gothe, H., Willis, J., Snow, P. and Kugler, J. "Clinical pathways: effects on professional practice, patient outcomes, length of stay and hospital costs". *Cochrane Database Syst Rev*. 17.3. <https://pubmed.ncbi.nlm.nih.gov/20238347/>.
- Rotter et al (2019). Rotter, T., Jong, R. B. de, Lacko, S. E., Ronellenfisch, U. and Kinsman, L. "Clinical pathways as a quality strategy". *Improving healthcare quality in Europe: Characteristics, effectiveness and implementation of different strategies*. Ed. by R. Busse, N. Klazinga, D. Panteli and W. Quentin. European Observatory on Health Systems and Policies. Chap. Chapter 12. <https://www.ncbi.nlm.nih.gov/books/NBK549262/>.
- Sailor et al (2021). Sailor, W., Skrtic, T. M., Cohn, M. and Olmstead, C. "Preparing Teacher Educators for Statewide Scale-Up of Multi-Tiered System of Support (MTSS)". *Teacher Education and Special Education* 44.1, pp. 24–41. DOI: 10.1177/0888406420938035. <https://doi.org/10.1177/0888406420938035>.
- Setkowski et al (2021). Setkowski, K., Boogert, K., Hoogendoorn, A. W., Gilissen, R. and Balkom, A. J. L. M. van. "Guidelines improve patient outcomes in specialised mental health care: A systematic review and meta-analysis". *Acta Psychiatrica Scandinavica* 144.3, pp. 246–258. <https://onlinelibrary.wiley.com/doi/full/10.1111/acps.13332>.
- Shoeffel et al (2020). Shoeffel, S., Toon, D., Rosenbrock, M. and Matthew, H. *Effective behaviour supports in schools*. Evidence for Learning. <https://evidenceforlearning.org.au/education-evidence/guidance-reports/effective-behaviour-supports-in-schools>.
- Sims et al (2021). Sims, S., Fletcher-Wood, H., O'Mara-Eves, A., Cottingham, S., Stansfield, C., Herwegen, J. V. and Anders, J. *What are the Characteristics of Effective Teacher Professional Development? A Systematic Review and Meta-analysis*. <https://files.eric.ed.gov/fulltext/ED615914.pdf>.
- Stanovich, K. E. (1986). "Matthew Effects in Reading: Some Consequences of Individual Differences in the Acquisition of Literacy". *Reading Research Quarterly* 21.4, pp. 360–407.

- Tamoliune et al (2022). Tamoliune, G., Greenspon, R., Tereseviciene, M., Volungeviciene, A., Trepule, E. and Dauksiene, E. "Exploring the potential of micro-credentials: A systematic literature review". *Frontiers in Education* 7. <https://www.frontiersin.org/articles/10.3389/educ.2022.1006811/full>.
- Thomson et al (2012). Thomson, S., Hillman, K., Wernert, N., Schmid, M., Buckley, S. and Munene, A. *Monitoring Australian year 4 student achievement internationally: TIMSS and PIRLS 2011*. Australian Council for Educational Research. https://research.acer.edu.au/cgi/viewcontent.cgi?article=1002&context=timss_pirls_2011.
- Thomson et al (2017). Thomson, S., Hillman, K., Schmid, M., Rodrigues, S. and Fullarton, J. *Reporting Australia's Results: PIRLS 2016*. Australian Council for Educational Research. <https://research.acer.edu.au/cgi/viewcontent.cgi?article=1000&context=pirls>.
- Thomson et al (2019). Thomson, S., Bortoli, L. D., Underwood, C. and Schmid, M. *PISA 2018: Reporting Australia's Results Volume I Student Performance*. Australian Council for Educational Research. <https://research.acer.edu.au/ozpisa/35/>.
- Uden et al (2014). Uden, J. M. v., Ritzen, H. and Pieters, J. M. "Engaging students: The role of teacher beliefs and interpersonal teacher behavior in fostering student engagement in vocational education". *Teaching and Teacher Education* 37, pp. 21–32.
- UK Department for Education (2023). *National behaviour survey: Findings from Academic Year 2021/22*. <https://www.gov.uk/government/publications/national-behaviour-survey-reports>.
- UK Department of Education (2022a). *Key stage 1 and phonics screening check attainment*. UK Government. <https://explore-education-statistics.service.gov.uk/find-statistics/key-stage-1-and-phonics-screening-check-attainment>.
- _____ (2022b). *Opportunity for all: Strong schools with great teachers for your child*. <https://www.gov.uk/government/publications/opportunity-for-all-strong-schools-with-great-teachers-for-your-child>.
- US Institute of Education Sciences (2013). *2013 State Snapshot Report: Mississippi*. US Department of Education. <https://nces.ed.gov/nationsreportcard/subject/publications/stt2013/pdf/2014464MS4.pdf>.
- _____ (2022). *2022 State Snapshot Report: Mississippi*. US Department of Education. <https://nces.ed.gov/nationsreportcard/subject/publications/stt2022/pdf/2023010MS4.pdf>.
- _____ (2023). *Practice Guides*. US Department of Education. <https://ies.ed.gov/ncee/wwc/practiceguides>.
- Venus, C. and Jamrozik, E. (2020). "Evidence-poor medicine: just how evidence-based are Australian clinical practice guidelines?" en. *Internal Medicine Journal* 50.1, pp. 30–37. ISSN: 1444-0903, 1445-5994. DOI: 10.1111/imj.14466. <https://onlinelibrary.wiley.com/doi/10.1111/imj.14466> (visited on 27/03/2023).