

Crisis? Which Crisis?: The state of education in Western Australia¹



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In recent years Western Australia has experienced fierce controversy over education, focused almost entirely on the introduction of an ‘outcomes-based’ approach to curriculum and teaching in upper secondary schools. It was a controversy that generated far more heat than light, with very little in the way of evidence being presented. Good evidence exists on the academic performance of Western Australian students. We summarise this evidence, and argue that it gives no indication that outcomes-based education is either detrimental or beneficial to student performance. In general, WA students perform well in three kinds of internationally benchmarked testing. The ‘educational crisis’ fever that was created by the news media and some commentators has no justification. If there is serious cause for concern, it is about falling entry standards amongst recruits to the teaching profession. We present the evidence for this fall and argue that, since good teaching is the best guarantee of continuing current academic standards, there is a need to raise the standard of teaching recruitment. This is especially so for the lowest-performing schools, where the best teachers are most needed.

The recently elected Liberal–National Government in Western Australia (WA) has taken the reins of an education system that has been frequently portrayed as being in a critically-poor condition. Ask any Western Australian about the state of education in the past few years and the likely response will be that there is a crisis: that state education is failing on many fronts. This response can in part be explained by the approach taken, initially, by the local daily paper, *The West Australian*, and latterly by the national daily paper, *The Australian*. Because of the hyperbole in the Western Australian media coverage, the so-called crisis in schooling in Western Australia became the centre of a heated national debate, although we might be better calling it a shouting match as there was not much that could be called considered debate in the media. Whatever it is called, what happened did little to shed light on the underlying issues and merely provided an opportunity for the media to kick something. The end result of the furore? There was a minor policy change in Western Australia following the departure of Education Minister Ljiljana Ravlich, but no significant effect on education policy anywhere in Australia.

¹ The authors would like to thank the anonymous reviewers and the editors for comments and suggestions that have helped us to improve this paper.

It is worth asking: Is there really a crisis? Further, we can also ask: If there are problems, what they are, and how might they be addressed? Our main contention in this paper is that there is no general crisis. The controversy over curriculum matters has dominated the WA education agenda in recent years, but with almost no evidence being presented as to the effect of curriculum change — whether detrimental or beneficial. The best measures available indicate moderately good academic performance in the WA student population, but with room for improvement. In our view, the main improvements needed are to the recruitment, performance and professionalism of teachers. This is not intended as an exercise in “teacher bashing”. Teachers and teaching have suffered on a number of fronts in the past decade, and the problems cannot be laid at the feet of individual teachers. But it still remains true that changes are needed — in recruitment, performance and professionalism.

Reform and Controversy

In the past decade there have been major reforms in the aims and the structure of school-based programs in WA, in the early, middle and later years of schooling. Since 2005, there has also been a massive upheaval in response to the reform process. Here we will describe how that story unfolded, trying — perhaps impossibly — to be fair to all sides. The fires of that controversy are still burning. We will look, *inter alia*, at three factors: where the issues emerged; who or what defined them; and in what terms they were defined.²

Reform

In 1997, following a 1993 inquiry into pre-compulsory schooling led by Barbara Scott MLC, the WA Department of Education took responsibility for the education programs for four year-olds and gradually brought pre-compulsory schooling on to school sites. This move was widely praised nationally across the education sector. Accompanying this was a change in the entry age to schools to bring WA into line with the other states. From 2002 those who turned five before 30 June could attend pre-primary programs administered by the Department. This ‘half-year’ cohort had a significant flow-on effect in subsequent years, with the 2003 intake into Year One being roughly half what it would normally be and in 2010, as the cohort enters Year 8 more primary teachers and fewer Year 8 teachers will be needed.

Most recently, at the other end of the age spectrum, following legislative change in 2005 it became compulsory in 2008 for students to stay at school or in structured workplace learning (such as apprenticeships) until the end of the year in which they turn 17. This has created increased pressure to find ways to enhance vocational education and to link this aspect of education with industry needs. Linking vocational education with school-based programs has been a troublesome issue and ensuring a vocational education program that is flexible and adaptive to changing technological and social needs remains a crucial factor in planning for the future. The need for better vocational education has been a continuing subtext of the frequent media stories on a national shortage of skilled workers. The skill shortage has been particularly prominent in WA because of the resources boom — a period of rapid economic growth that only slowed (but did not stop) due to the global financial crisis in 2008–9.

² This follows roughly a process of analysis described by Michel Foucault in *The Archaeology of Knowledge* (Foucault 1972). As Haynes (1997:237–241) has noted, ‘A controversy is a public dispute in a community which is taken seriously until it reaches closure’. It has a stimulus, an issue, a context, a set of protagonists, a body of arguments, some constraints, a sequence of events, a form of closure and some lasting consequences.

The biggest change to education began in 1995 when the Temby Report (Government of Western Australia 1995) recommended the establishment of the Curriculum Council³ and started the ball rolling for the introduction of outcomes-based education. The *Curriculum Council Act (1997)* provided the legislative base to establish the Curriculum Council of Western Australia and in June 1998 after seven months of consultation with more than 10,000 respondents the first *Curriculum Framework* (Curriculum Council of Western Australia 1998) was launched by Colin Barnett, who was then Education Minister in Richard Court's Coalition Government.

The *Curriculum Framework* marked a major change in education policy. It established the principle that education was to be based on student achievement of specified learning outcomes rather than 'a focus on educational inputs and time allocation' (Curriculum Council of Western Australia 1998:6). It specified outcomes in eight learning areas and established five core values which had to be addressed within classrooms. Significantly, the *Framework* was also mandated to be introduced in all schools — State, Catholic and Independent — and the change would apply from Kindergarten to Year 12. Schools could opt out only by arguing for a special exemption.

The theory of 'outcomes-based education' — now commonly known as 'OBE' — which formed the key element in the changed education policy derives from the work of educationalist William Spady, and can be summarised as five main points:

- In constructing a curriculum, we should begin with the intended end (the 'outcome' that we want students to achieve) in mind and 'design back' from there
- Allow individual schools and teachers to design a teaching program around the predetermined outcomes, using their own expertise and initiative
- Avoid norm-referenced assessment, and focus on showing students' individual progress
- Allow students as much time as they need to demonstrate mastery of concepts and content
- Place as much focus on the process of learning as on the subject matter to be learned.⁴

The rollout of the *Curriculum Framework* began in 1999 with full implementation due by 2004. This timeline was not met, despite support for the change from the Gallop Labor Government when it took office in 2001. The Framework was taken up in primary schools with few major dramas. However, it did involve a lot of hard work by teachers as the Framework did not prescribe a curriculum, but asked teachers to develop materials that would enable students to achieve their outcomes. The early years of high school likewise proceeded to implement the new program with few major problems and without major resistance.

Controversy

However, changes to the final two years of schooling have been much more problematic. The changes were threefold: the introduction of the *Curriculum Framework* to these years, change to the school leaving age, and the 2002 publication of *Our Youth, Our Future*

³ The 2008–9 State Budget foreshadowed the creation of an Education Standards Authority comprising five eminent people to replace the 14-member Curriculum Council.

⁴ See Berlach and McNaught (2007), Spady (1994) and Spady (1998) for a discussion of these principles.

(Curriculum Council of Western Australia 2002), which formed the basis of the new Western Australian Certificate of Education (WACE). The new WACE reduced the number of courses available from about 150 to 52, with some courses (e.g. aviation, engineering, psychology, and philosophy) being introduced in Western Australian schools for the first time. Each WACE course was intended to provide opportunities for students of all capabilities to achieve outcomes at prescribed levels. This was not in itself a radical change: all other states and territories in Australia based their curriculum around a standards-referenced system, and such a system had been implemented smoothly at the lower levels of schooling (Tognolini 2006:4). Despite this, a strong campaign led by the state's daily newspaper *The West Australian* managed to put the changes in a relentlessly negative light and the new WACE courses became a political football.

What followed, beginning in 2004, was a community-wide controversy which is still not fully resolved. The controversy in WA was part of a national debate on education policy, though in these years WA was the main focus. The controversy was also a confusing one, involving disputes and differences of various sorts. In public debate the notion of 'OBE' was almost always ill-defined and therefore often a catch-all for a variety of grievances. A headline in *The West Australian* — 'Hired hands duck for cover in shoot-out at the OBE corral' — succinctly summarises the tone of the media's coverage of the issue (Taylor 2006). The coverage hit a low point of bad taste and journalistic bias when a very unflattering photograph of the then WA Education Minister Ljiljana Ravlich was depicted in a 'Wanted' poster on the front page, as a result of which she lost her ministry (*The West Australian* 2006).

The controversy was not well explained in the media, but can be reduced to four main contests. Three of these are educational matters:

- *Curriculum versus syllabus*: between those who advocated a 'curriculum', which specified outcomes and general content, and those who advocated a 'syllabus', with prescriptive and detailed course content;
- *Raising up versus dumbing down*: between those who saw the new curriculum content as well-designed and adequate and those who claimed to find at least parts of it symptomatic of falling academic standards; and
- *Levelling versus norm-referencing*: between those who regarded outcomes-based 'levels' as an adequate assessment of student performance for university entry purposes and those who insisted that scores must be norm-referenced.

The fourth focus of discussion was about the rate of transition to the OBE model. Critics — including some prominent school principals, the teachers union and the then Commonwealth education minister Julie Bishop, also the Member for the WA seat of Curtin — called for slower implementation, so that the new courses of study were more fully developed and better prepared. In 2005, in response to public and teacher discontent, the State government established a *Parliamentary Inquiry into Changes to the Post-Compulsory Curriculum in WA*. The issues were canvassed by most of the interested parties. The Committee, chaired by Labor MP Tom Stephens, reported on June 29, 2006. A majority report generally supported the OBE implementation process. A minority report dissented, though only about transitional matters, recommending a one-year delay in the implementation process to 2008 (see Stephens 2006, for the majority and minority reports).

The dominance of transitional matters in the public and political debate tended to cast the more basic questions into the background. This, however, was not an argument against the

introduction of OBE. Director of Catholic Education in WA, Ron Dullard took the view that, despite the controversy and the serious transitional difficulties, 'OBE is a fantastic education system that has operated successfully in primary schools and lower secondary school since 1998' (ABC News Online 2006). A similar view was expressed by Joy Shepherd, principal of St Hilda's Anglican School for Girls when she wrote in a newspaper article:

Implementation (of the Year 11 and 12 courses) must be delayed while educators reclaim the agenda and resolve their genuine concerns. These concerns are not with an outcomes-based approach. Teachers are supportive of an approach which sees learning as a continuum on which students' progress is mapped according to what they know, understand and are able to do as a result of their learning. (Shepherd 2006)

The case for the OBE approach was put by Dean of Education at Murdoch University, Barry Kissane, using mathematics as his key example. In his view, mathematics courses in Years 11 and 12 have been dominated by a syllabus in which teaching is reduced to inculcating 'collections of mathematical procedures, with an emphasis on things that can be tested in timed, written examinations'. By contrast, under an OBE approach, 'A careful description of what outcomes we intend students to attain, with clear descriptions of progress points along the way, and a structure that makes clear how the outcomes are related to each other and to outcomes identified in the compulsory years, seems a much more defensible system' (Kissane 2006).

Evidence of student performance

One might expect a policy change of the magnitude of the OBE and the Curriculum Framework to be based on solid evidence. But this is not obviously so. Good evidence on OBE — for or against — is difficult to find. Before trying to analyse the OBE evidence, we need first to examine the evidence on student performance. A decade ago, there was very little such evidence. Today, there are three main bodies of evidence by means of which we can evaluate the effectiveness of schooling in Western Australia. This evidence permits us to compare WA schooling with other states and other countries.

The OECD Programme for International Student Assessment (PISA) assesses the scientific literacy, mathematical literacy and reading literacy skills of 15 year-olds in many countries. Testing has been conducted in 2000, 2003 and 2006. In 2006, more than 14,000 Australian students were tested in all states and territories and in all school systems. The results of PISA 2006 have been broken down to the state level, so that it is possible to set WA in both a national and an international context (PISA 2009).

The PISA findings are an impressive endorsement of Australian schooling in general, but especially so for Western Australian schools considering the negative light in which the State's education system has been cast in recent years. They show that in scientific literacy, mathematical literacy and reading literacy, WA students are performing on average close to the best in the world and at the highest level compared with the other Australian states (Thomson and De Bortoli 2008 and ACER 2007). In all three categories WA ranks slightly behind the ACT and better than any other state. In all three categories, the states rank as follows: ACT, WA, NSW, SA, Qld, Victoria and Tasmania. All states (but not the NT) ranked clearly better than the OECD average. On scientific literacy, WA students rated as well as the second and third performing countries, Hong Kong and Canada. On mathematical literacy, WA was close behind the top-ranking country Taiwan.

Another important international comparison, the Trends in International Mathematics and Science Study (2009) (TIMSS), surveys the mathematics and science knowledge of fourth- and eighth-grade students in more than 40 countries. Because much of the furore in the state's media has concentrated on perceived problems in high schools, we will focus on the eighth-grade findings only. TIMSS testing has been conducted in 1995, 1999, 2003 and 2007.

According to the 2003 TIMSS findings, Australian Year Eight students perform on average better in maths and science than the international scale average of 46 countries, though better in science than in maths. Australia ranked 14th in mathematics and 11th in science. In science WA students performed at the Australian average. In maths they performed below the Australian average, behind NSW, ACT, SA and Victoria, and on par with Qld. However, it is worth noting that they are half a year younger than the Australian average.

In the 2007 TIMSS, Australian Year Eight students performed on average better in science than the international scale average of 48 countries, though very slightly below average in maths. Australia ranked 13th in science and 14th in mathematics. The trend in maths scores is slightly downwards (by 2.6 per cent since 1995); in science scores the trend is flat. In both maths and science there was no statistically significant difference between the mean score for WA students and that for the other states (Thomson et al 2007: Tables 3.1B and 4.1B).

The variation in the findings of PISA and TIMSS can be explained, with one commentator summarising the difference between the favourable PISA findings and the less favourable TIMSS findings in this way:

PISA assesses careful reading, logical thinking and the application of general mathematical and scientific processes and principles to everyday problems. TIMSS assesses mastery of the factual and procedural knowledge taught in school mathematics and science curricula ... In Australia ... students perform better (on average) in applying general mathematical and scientific principles and skills to everyday problems than in recalling and using curriculum-based factual and procedural knowledge (ACER eNEWS 2005)

WA students do very well in PISA but significantly less well in TIMSS. We cannot say whether this discrepancy is also found between reading literacy and knowledge, as Australia does not participate in the TIMSS-style Progress in Reading Literacy Study. What is known, however, is that WA students perform very well in reading literacy as assessed by PISA.

Australia also has a relatively new system of internal reporting on literacy and numeracy benchmarks. These are carried out under the supervision of the Ministerial Council on Education, Employment, Training and Youth Affairs (MCEETYA). In 2005 benchmark testing was carried out for Year Seven students for the first time, with annual tests for 2006, 2007 and 2008. Tests for spelling and grammar/punctuation were added in 2008. Table 1 provides details on the test results for WA and Australia-wide students, where these are the percentage of students achieving the minimum benchmarks.

Table 1: MCEETYA Test Scores: WA and Australia

Benchmark Area	Year	WA	Australia
Reading	2005	85.6	89.8
	2006	88.4	89.2
	2007	84.1	89.3
	2008	92.8	94.2
Writing	2005	87.7	92.2
	2006	85.5	92.4
	2007	85.2	92.5
	2008	90.2	91.8
Spelling	2008	90.7	92.4
Grammar/Punctuation	2008	88.3	91.6
Numeracy	2005	84.3	81.8
	2006	84.5	79.7
	2007	83.8	80.2
	2008	94.8	95.4

Source: MCEETYA (2008) *National Report on School in Australia*, Canberra: MCEETYA, Tables 3a, 3b and 3e; MCEETA (2005–2007) *National Report on School in Australia*, Canberra: MCEETYA, Tables A7, A8 and A9.

In these tests WA Year Seven students performed better than or very close to the national benchmark average in numeracy. They have done less well in reading and writing, and this may look like evidence of a relatively poor performance by WA schools in these categories. However, at the time of testing WA students were younger and had had fewer years of schooling than their counterparts in the other states, being about half a year younger than the national average. This suggests that there is little difference between WA and other Australian students. It is noteworthy also that the WA ‘deficit’ in reading and writing is much reduced in the 2008 tests.

In summary, WA students compare well with their counterparts in other states. Internationally speaking, they do well on the PISA tests, though less well on the TIMSS tests.

What does this tell us about the OBE controversy? It is interesting, firstly, to compare the viewpoints of expert OBE commentators on the empirical evidence. According to critics Richard Berlach and Keith McNaught, ‘until compelling evidence for the success of OBE can be presented, then the value of the theory for practice remains suspect. To date, such evidence does not appear to exist’ (Berlach and McNaught 2007). According to another critic, Kevin Donnelly, ‘notwithstanding the millions spent on educational innovation represented by OBE over the last decade, standards have failed to improve’ (Donnelly 2004a, 2004b and 2007). This implies that there is evidence on the performance of the OBE approach. Donnelly contends that ‘those countries that perform best in international tests, such as the Netherlands, the Czech Republic, Singapore and South Korea, forsake outcomes-based education in favour of what is called a syllabus approach’ (Donnelly 2004a). This may be so, but it hardly constitutes a compelling argument against OBE as such, firstly because Australia scores well on the international tests and secondly because his claim does not show that the syllabus approach is the primary reason why those countries do well — it may well be irrelevant. By contrast, Bill Loudon, Professor of Education at The University of

Western Australia and the new chairperson of the Curriculum Council of Western Australia, observes that ‘in terms of the improvement or decline of standards, if you look at the literature about what makes a difference to improvement, it is never things to do with curriculum structures, curriculum frameworks and state-wide boards of studies. ... What drives improvement in schooling are teachers, one by one’ (Louden 2004).

What can we say about the relation between OBE and the empirical evidence? Have WA students’ test scores improved or declined as a result of OBE? The new testing regimes date back to 1999 for TIMSS, to 2000 for PISA, and to 2005 for the national benchmarking. During that period, the OBE ‘revolution’ was taking place. But it is not easy to connect the two.

- OBE and benchmark testing of reading, writing and numeracy started about the same time, so there is no real ‘before’ data by means of which to make any ‘before and after’ comparisons.
- If we could compare PISA 2003 with PISA 2006, we could get a comparison between pre-OBE and post-OBE students, with the 2006 students having had six years of OBE schooling, while in 2003 students would have had little OBE experience. However, PISA 2003 did not release state-level figures, so that comparison can not be done.
- A comparison of TIMSS 2003 with TIMSS 2007 for Year Eight students can serve as an indicator. This shows no statistically significant change in mathematics performance, and a small decline in science performance where the mean score fell from 520 to 506 (Thomson et al 2007).

If all this is true, then both defenders and critics of OBE in WA are mistaken if they claim to have much Western Australian test-based evidence for their position. We do have PISA and TIMSS results for students who have been educated largely under an OBE approach, and those results are good by world standards. The only ‘before and after’ evidence to help with judgements on the impact of OBE is the TIMSS comparison, which does not show any large decline in performance. There may be ‘before and after’ evidence from other states, where OBE was in operation before WA. However, it is notable that the critics of OBE have not produced such evidence.

Changes to Year 11 and 12 courses

In 2007, the OBE controversy came to a head. In January, the newly appointed education minister Mark McGowan announced the end to several controversial elements of the Year 11 and 12 courses and teacher ‘juries’ were appointed to review the readiness of the new courses for implementation. As a result of the jury process, 11 of the 52 new courses were listed for implementation in 2008, with 27 courses deferred to 2009. By 2010 it is intended that the implementation of all new courses will have begun and the main thrust of *Our Youth, Our Future* — the introduction of the new courses — will have been accomplished and in doing so a significant policy innovation will have weathered a storm — but not without damage.

The OBE philosophy at the heart of the policy will have been modified substantially. For example, as a result of two specially-commissioned studies, the Andrich and the Tognolini reports, Year 11 and 12 students will be assessed using a numerical scale as well as the levels and bands of the OBE approach. This permits fine-grained discrimination for the purposes of forming a Tertiary Entrance Score. There will also be compulsory exams for all Year 12 students, except those doing trade certificates (ABC News Online 2007; Andrich 2006; Tognolini 2007).

Perhaps more significantly, a new syllabus for kindergarten to Year 10 was announced, and formalised in December for introduction in 2008 — though as voluntary rather than mandatory for schools. In announcing the introduction of syllabi, McGowan said: ‘This is the end of a system that was in place which relied on an overarching framework with objectives, and allowed teachers just to use their skill and ingenuity. That was a philosophy, a fad, which was in place in the 1990s. We have now moved back to a syllabus’ (ABC News Online 2007b).

But this is misleading as much remains of the OBE approach:

- The curriculum still begins with the intended end (the ‘outcome’ that we want students to achieve) in mind and is ‘designed back’ from there
- Although there is now a syllabus in all courses, individual schools and teachers are still permitted to design a teaching program around the predetermined outcomes, using their own expertise and initiative; and the introduction of syllabi is less of a change than it might seem, since all Year 11 and 12 courses already contained substantial ‘essential content’ requirements
- Assessment is still focused on showing students’ individual progress, but norm-referenced assessment is also conducted at Years 11 and 12
- The *Curriculum Framework* is still the basic educational charter for schools, teachers and parents in all sectors and systems.

Poor media and an effective lobby group

Overall, the four year OBE controversy was painful for the government of the day and destructive of trust in the teaching profession. Large scale curriculum changes are inevitably disruptive. But there were in this case two factors that magnified the pain. One was the low quality of the media performance and the other was the rise to prominence of a lobby group, a rise promoted by this same media. Press treatment — especially in the case of *The West Australian* — was relentlessly negative and significantly biased. The reportage was characterised by a lack of balance and promoted sectional voices to the status of leading commentators.

A second factor was the powerful role played by the lobby group PLATO (People Lobbying Against Teaching Outcomes). PLATO was a new phenomenon in state politics, being the first action group to generate wide support through the use of a website (www.platowa.com). The PLATO website, which is no longer live, gave a voice to the critics of OBE. How far it spoke for the broader membership of the teaching profession is open to debate. What is clear is that its instigators, Greg Williams and Marko Vojkovic, gained a media presence far exceeding that of any OBE supporters, particularly in *The West Australian*. Other media attempted some balance, such as this example from the ABC’s *Stateline* program which records the comments of a teacher at Balga Senior High School, Geoff Holt, on OBE: ‘Really I have to say it’s accelerated the outcomes of students who otherwise I believe wouldn’t have even graduated and finished Year 12’ (Stateline 2006). However, opinions of this sort generally did not get equivalent coverage to the opinions of the PLATO group, which *The West Australian* cited repeatedly throughout 2006 and 2007.

This is not a criticism of PLATO, and it is worth here quoting PLATO’s mission statement, which makes their essential position quite clear:

- We support ... the practice of adopting outcomes that set quantifiable standards in academic skills and subjects, and whose accomplishment by students can be verified through objective testing.

- We absolutely condemn the setting of pseudo-standards that are vague, not academic or practical in nature, and therefore cannot be verified through objective testing.
- We also condemn the installation of overclaimed and unproved educational methods, whose only merits are their novelty and the evangelism by which powerful, bureaucratic non-practitioners seek to impose them.

Their third contention is the most controversial as the real merits of OBE remain disputed, and there is no clear evidence to settle the matter.

It appears clear that the decision to introduce the reform was made without a well-tested evidentiary basis. Helen Wildy notes that ‘like many curriculum and schools reforms, OBE was introduced with precious little supporting evidence. It is generally agreed that school restructuring of any kind has little impact on student outcomes. I believe we, as a nation, need to put in place a serious educational research agenda. There is no doubt that schools and systems have vast quantities of data, but we are currently not using these data in thoughtful ways to find out which, of the myriad interventions in schools, are actually making any difference’.⁵

Where improvement is needed

In policy terms, it is far from clear what to make of all this. Where to from here? From all points of view, after a bruising few years, a period of non-change would be a good thing. One key point is that, in general, Australian schools — WA included — are doing well by world standards. Ten years ago this was not known. In the heat of the OBE debate, it was contested, though in a polemical rather than a rational manner. Public trust in schools was damaged by polemicising and media bias as much as by any rash implementation of the OBE approach. In any case, that implementation went smoothly up to the post-compulsory phase, and it involved very little that was new from a national perspective.

If there is a clear need for further change and improvement, it is in the minority of schools — most of them government schools — that are suffering from a variety of deficiencies and deficits. Despite the high average performance of WA students, there is a ‘tail’ of low-performance, most notably amongst indigenous students.⁶ This tail needs to be the focus of our best efforts in the next few years and policies informed by sound evidence need to be implemented to shorten this ‘tail’. However, we do not need a new curriculum for this bottom quintile of schools. Most of all we need good teachers who can teach in schools with a high percentage of under-performing students. This is a systemic problem. Its solution is a matter of good government policy and good school management, not of further curriculum changes.

Teachers and Teaching

Teaching is both a craft and a profession. Some of what makes a person a good teacher is intuitive and is learned essentially by practice and from role models, as befits a craft. But as a profession, teaching should be both research-based and largely self-governing, setting its own standards of good performance. As a research-based profession, entry must be through universities, and entrants should have demonstrated high intellectual standards (see

⁵ Helen Wildy cites the work of Joseph F Murphy of Vanderbilt University.

⁶ For data on the performance of indigenous students in maths and science across Australia, see table 5.10 in Thomson et al 2007.

Pepper 1987 and Pritchard 2006 for a discussion of this point). There is, however, evidence of falling standards for entry to university teacher education courses.

Good teaching is the key

The self-governing aspect of the profession has always been difficult to ensure because the market place for teachers is dominated by a very small number of employers, who themselves shape the ethos of the teaching body. Educational research has shown just how important teachers are for student performance. For Bill Loudon, the core of the problem with education in Australia is getting and keeping good teachers. This view is confirmed by Dinham et al (2008) in a report funded by the Business Council of Australia. A similar view is emphasised by John Hattie, who contends that teachers 'account for 30 per cent of the variance [in student performance]. It is what teachers do, know and care about that is very powerful in this learning equation. And it is the one source of variance that can be enhanced ... We need to fairly and dependably recognise excellence in teaching, and use these excellent teachers to lead the improvement of teaching' (Hattie 2003).

The full professionalization of teaching is the key aim of the new Western Australian College of Teaching, formed under the *Western Australian College of Teaching Act (2004)*. Its aim is to recognise, promote and regulate the teaching profession in WA. It will approve teacher education courses, set minimum criteria for graduates and formulate a set of professional standards and a code of ethics for the profession. It will administer 'working with children' checks. Given that teaching has been professionalised in a de facto manner for many decades, it seems extraordinary that it has taken so long to form such a body. Some teachers resisted (unsuccessfully) being registered with the new authority.

The College of Teaching was established in parallel to the national body, Teaching Australia whose aims are to support and advance the quality of teaching and leadership; strengthen and advance the standing of the profession; and develop as the national body for the teaching profession. Teaching Australia is a public company established under the Commonwealth Corporations Act (2001) and funded by the Australian Government. The Minister for Education, Employment and Workplace Relations is sole member of the company, although there is an independent board (see Teaching Australia 2009 for details). It began life as the National Institute for Quality Teaching and School Leadership (NIQTSL) and changed its name to Teaching Australia in 2005. One might question whether either the College of Teaching or Teaching Australia is fully independent of government; that remains to be seen. In any case, each has a large task ahead of it just in ensuring graduate standards.

Decline in entry standards

A snapshot of the Tertiary Entrance Rank scores for students entering education courses in WA (see table below) shows a significant decline over the four years to 2007. This confirms Loudon's observation to the 2007 Senate inquiry that the quality of students entering teaching had fallen. He attributed the decline to a number of factors. The major, and intractable, factor was that 'the social status of teaching' had dropped dramatically. Other factors included the ending of a 'genetic subsidy' in which talented women had in earlier decades entered teaching because society led them to think that they could not or should not take up careers as, for example, lawyers; and the ending of bursary schemes that paid for working class people's higher education.

Table 2: Cut-off entry Tertiary Entrance Rank scores for selected education courses

	2003	2004	2005	2006	2007
Edith Cowan University (Joondalup)					
Education Kindergarten through primary		73.6	70	65.15	66.2
Edith Cowan University (Mount Lawley)					
Education: early childhood		73.5	70	65	65.25
Education primary	74.3	77	70	65.3	65.65
Curtin University of Technology (Bentley)					
Early Childhood teaching	81	85.3	75	70.35	71.05
Primary Education	82.45	86.65	75	70.25	71.5
Secondary teaching	81.3	86.2	75	70	71.25
Murdoch University (Murdoch campus)					
Primary Education	80	80.1	70	62	65
Secondary Education	78.15	77	70	62	65

Source: TISC (2009)

Note: In WA, a TER of 70 is the equivalent of a student scoring 50 in four tertiary entrance subjects (Louden 2004).

Improving the social status of teaching was a stated goal of a WA Department of Education Services (DES) strategic issues paper in 2006 (DES 2006). This paper noted that most of the people interviewed for the issues paper 'voiced their concerns about the "talking down" of the teaching profession in the Press'. The issues paper identified a sharp downturn in applications for education courses beginning in 2007, noting both the decline in status and a tight labour market brought on by the mining boom as relevant factors. The Business Council of Australia (BCA) entered the national debate in May 2008 (see Dinham et al 2008). This prompted headlines focusing on an earlier (2007) recommendation — that teacher salaries be doubled in return for meeting specific criteria. The BCA recognised that remuneration was not the only important issue and made a number of recommendations, including: the introduction of a new governance framework that provides principals with greater autonomy; the introduction of a national curriculum; early intervention to prevent students falling behind; and greater investment in education and training in return for the achievement of the other reforms.

Industrial relations

Increasing salaries has been one of the two major foci of the State School Teachers Union of Western Australia. The other has been workload issues around duties other than teaching, student behaviour management and class sizes. The industrial climate has been antagonistic, with teacher campaigns on a number of issues leading to work bans and stop work meetings, both having a significant impact on parents. The current enterprise bargaining agreement for teachers ended in February 2008, with negotiations for a new agreement beginning late in 2007. In June 2008, following an application by the WA Department of Education and Training, the WA Industrial Relations Commissioner ended the enterprise bargaining process and moved the dispute to arbitration. In September 2008 Department teachers rejected a pay offer that media reports claimed would have made them the best paid in the country. The offer of pay rises of between 15 and 21 per cent was made

by the Carpenter Labor Government before the State election was called, but a ballot of State School Teachers' Union members rejected the offer. The Carpenter Government was defeated in 2008 and the incoming Liberal–National Government of Colin Barnett moved quickly to resolve the stand-off with teachers. Early in December 2008 teachers accepted a pay rise ranging between 20 and 23 per cent. This made WA teachers the highest paid in the nation (ABC News 2008).

One element of the dispute arising from the protracted enterprise bargaining negotiations between the Government and state school teachers and TAFE lecturers was the Union's call for the Government to release a report into teacher supply problems (Government of Western Australia 2007 — 'The Twomey Report') commissioned by Education Minister Mark McGowan. The report was completed and submitted to Cabinet in December 2007, but not released until June 2008. On its release the Liberal Party Education Spokesman Peter Collier praised the report, saying: 'Quite frankly, if the Government wants to be serious about overcoming the teacher shortage and prevent a crisis in three years it must embrace the recommendations of Professor Twomey' (ABC News 2008). From this we might conclude that if the new Liberal–National Government is true to its pre-election statements it will adopt the main recommendations.

The report notes the following 'areas that call for immediate attention and action':

- Increased remuneration for the existing teaching, TAFE lecturing and support workforce, across the board.
- A better system of career progression for all staff within schools and colleges.
- A comprehensive, merit-based scholarship system aimed at attracting intelligent, high-achieving individuals into teaching and lecturing.
- The need for a considerably greater number of student practicums in regional areas.
- A much greater number of para-professionals in classrooms to support teachers.
- Attention to housing and workplace conditions for teachers and lecturers in regional and remote areas. (Government of Western Australia 2007:8)

Although salaries for starting teachers are good relative to other professions (Government of Western Australia 2007:Table 1), this cannot be said for more experienced teachers, even after the December 2008 pay rise as this across-the-board rise maintained existing relativities between less and more experienced teachers. For Horsley and Stokes (2007), the wage relativity situation is worst for the most experienced teachers. Between 1996 and 2002, for example, graduate salaries increased 27 per cent in real terms while salaries for the highest paid increased only 3 per cent in the same period (p. 95). They argue also that the industrial relations system itself has contributed strongly to a decline in pay relative to other professions and to the attrition of teacher numbers. Admittedly they are writing about New South Wales, but there are sufficient similarities between the states to note their claim that 'Increasingly public sector employees see that the current wage determining process results in a further decline in their salaries compared to those of cognate professions in the non-public labour market' (Horsley and Stokes 2007:95).

The problem of keeping good teachers has been exacerbated by the number of baby boomers leaving the industry and the lack of promotional prospects for teachers wanting to remain in the classroom. The baby boomer teachers were, in the main, taught at school by well-qualified graduates of an elite university system and they in turn became the product of a higher education system for which entry was available to few. Such baby boomer teachers were generally highly competent in their fields (Louden 2004). This is in contrast to the current low entry requirements for teaching.

A significant concern is the lack of a merit-based career path for high quality teachers. New teacher graduates across Australia enter the workforce earning around 75 per cent of the average pay rate for teachers. The average for graduates in other professions varies between 60 and 65 per cent of the average pay in the profession (Australian Education Union 2006). However, teachers reach their maximum salary early and there is no mid-career promotion pathway. The lack of a career path for in-class teachers was partially addressed in the late 1990s with the introduction to WA of the category of Level 3 Teacher. This arose from an Enterprise Bargaining Agreement between the State School Teachers' Union and the state Education Department. It was received positively by principals, but Level 3 teachers reported continuing problems with time and unrealistic expectations (Wildy et al 1999). Gaining the status of Level 3 Teacher was, and is, difficult and gave such teachers and their schools a relatively small benefit in time and money. The initiative is one of three in Australia that use a standards-based assessment process to reward good teachers. (The others are in Northern Territory and South Australia.) An issues paper from the Department of Education Services (DES) in 2006 suggested that further categories be added to the classification of senior teachers to provide a career path for those choosing not to move into administration (DES 2006: 5–6).⁷ Twomey makes a similar recommendation (Government of Western Australia 2007:28). These recommendations need to be considered seriously in developing education policy in all states and territories.

Shortage

The Department of Education and Training (DET) recorded 206 vacancies at the start of the 2007 school and 79 at the start of 2008. Most of these were secondary vacancies in Science, Maths, English and Design Technology. Filling vacancies in Maths, Science and Design Technology proved problematic as the skill set of teachers and graduates in these areas were also valued in the resources industry, which was in a boom period (DET 2008).

Although, reportedly, 500 fewer teachers are required in 2010, because this is when the so-called 'half-cohort' enters Year 8 (Stack 2009), teacher shortages are expected to increase from 2011 as baby boomers exit the system. Major shortages are expected between 2012 and 2017. The impact of retirement will be greatest in the public sector, where the age profile is older than in the private sector. The Department has also forecast a significant shortage of primary teachers from 2010 as the 'half-year' cohort moves into secondary school. This shortage will be exacerbated by an increased birth rate and high net migration occasioned by the economic boom. Although the 'half-year' cohort will create a relative surplus of secondary teachers, this will likely be countered by a high rate of retirement. The 'half-year' cohort will have strong ramifications for class sizes and demand for teachers and the effect is likely to be greatest in the public sector, as the private sector will actively recruit to maintain its student establishment.

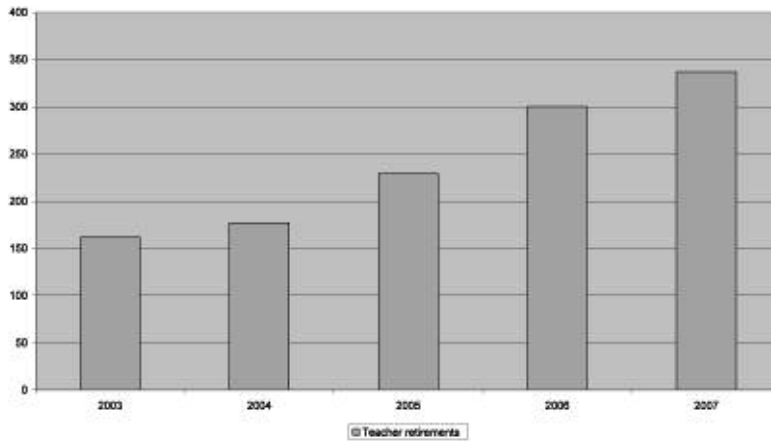
The Department identified the following as factors contributing to teacher shortages:

Demand

The number of retirements increased 220 percent between 2003 and 2007 (see table below) and up to 30 per cent of current teachers intend to retire in the next five years. More than 3000 teachers were at or above retirement age (55) in 2007, with 1000 of these being 59 or older. The number of teachers leaving teaching to take up other work has increased from 58 in 2003 to 210 in 2007.

⁷ In this context, it is worth noting Hattie's (2003) recommendations for New Zealand: 'The current system promotes teachers by experience and then offers "management units" as an incentive to take more senior roles. We need, however, a promotion that is based more on excellence and experience, and that ensures that the highest paid person in any school is the experienced expert teacher — not the experienced teacher who also manages.' (p. 11).

Figure 1: Teacher Retirements



Source: Department of Education and Training, *WA Teacher Demand and Supply Projections*, February 2008, p 6.

However, student numbers (up to and including Year 10) are projected to increase from 359,139 in 2007 to more than 400,000 in 10 years time. Clearly, increasing numbers of students and declining numbers of teachers presents WA with a problem for which there is no immediately obvious solution as any remedy needs to address the status of teaching. Increasing pay is a good start, but finding a way to keep good teachers in the classroom is also needed. And to do that there needs to be a career path that does not require teachers to move into administration to get promotion.

Supply

The number of students who choose teaching as their first preference for a university place fell from 3175 in 2003/4 to 2088 in 2007/8. The number of enrolments fell from 2569 in 2003/4 to 1760 in 2006/7. The decline in enrolments can be partly explained by a decline in mature age student numbers, which itself is due primarily to a strong labour market. This may also explain the high percentage of Western Australian applications being offered a university place. For example, in 2007 in WA 16,831 people, representing 91.5% of all applicants, received an offer of a place at a university. This is the highest acceptance rate of all the states and stands against the national average of 82.7%. For the other states in the same year the percentage of applicants receiving a university offer was as follows: NSW/ACT 81.1%; Victoria 82.8%; Queensland 85.4%; SA/NT 75.5%; Tasmania 82.9% (DEEWR 2008).

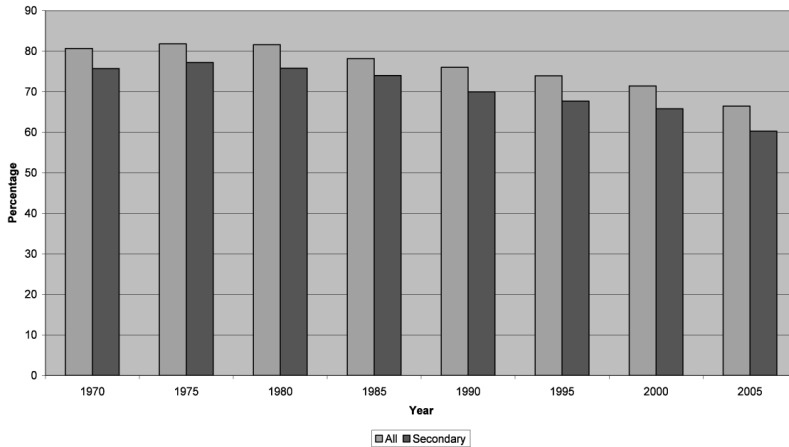
There is a shortage of teachers, but as the DES issues paper notes, increasing the numbers alone will not solve the problem, because there is not sufficient information to predict where the areas of greatest demand are likely to be and because it is very difficult to identify even current shortages of specialist teachers (DEEWR 2008). The first problem is compounded because there is no system to organise the data adequately to provide the complex information required. The second problem is exacerbated because Heads are required to fill vacancies with existing staff and identify a specialist vacancy only when there are no other staff available.

Residualisation and going private

It is well-known that there is a long-term trend toward private schooling, though the strength of the trend should not be overstated. The rise of low-fee independent schools has gradually

changed the educational landscape. As is shown in the graph below, since 1980 there has been a drift to private schools of 15 per cent of all enrolments. If it continues as at present, in 2020 about 43 per cent of all students will be in private schools.

Figure 2: WA Government School Students as a Percentage of All WA Students



Source: ABS Cat. No. 4221.0, Schools Australia.

The implications of this trend are still debatable. One view of considerable concern is that state schools will have an increasingly high percentage of students whose families do not value education or who are not in a position to provide multi-faceted support for their children's education. Bill Loudon contends that, as a result of this trend, 'government schools become schools that are residual. They are for the kids whose parents are not organised enough and who do not have such a high valuing of education and the other kids get pulled out of it ... The impact of residualisation is a matter of time. I am very gloomy about that' (Louden 2004).

Clearly, unless the basic Commonwealth and state funding factors are changed (which seems unlikely), one solution is to find a way to bring good teachers into the least successful schools. The State Government went part of the way in 2007 when it gave permanency to 404 teachers in country schools who had been on short-term contracts. But there is also the more general problem of attracting talented students into teaching. The scholarship schemes introduced by the State Government in recent years do not go far enough in redressing the decline of standards for entry into teaching. A return to some form of the bond scheme that brought talented teachers into the profession in the 1970s is worth considering. For example, students with the greatest aptitude (measuring this is, of course, not unproblematic) might receive a HECS scholarship and a living allowance. In return they would sign up to work for a period in hard to staff schools — but also be guaranteed permanent employment.

The difficulty of the problem is multiplied for indigenous education in remote schools. The difficulties do not need detailed explication (see Storry 2007 for an overview). Here is Chris Sarra's (2008:20–21) suggested solution to the problem:

Let's say to principals and teachers that we understand these schools require high-calibre people on a continuing and sustainable basis. The data says that these schools clearly need the best quality teachers ... Let's ... create opportunities for all accomplished teachers and school leaders to embrace the challenge and privilege of teaching in remote

Indigenous communities. ... Let's harness the passion and enthusiasm of young 'rookie' graduates, along with experienced and exceptional teacher leaders. ... For example, why not have recent graduates being able to pay off their HECS debt through community service in Indigenous communities and schools. And we need late-career Golden Gurus to address the vacuum about to be created by the impending retirement of the baby boomers — many of whom are school leaders or senior teachers in our schools. Providing short-and medium-term opportunities to 'give back' to our profession will appeal to many of our colleagues — mentoring young teachers and providing much needed expertise. We could build on these ideas and others that are currently working — such as teacher and principal exchange programs, peer mentoring, artists in schools, visiting 'experts' and professionals.

Conclusion

The past decade has been a period of significant and frequent change in education in Western Australia, and also of often fruitless controversy. The primary point to note in reflecting on this period is that the academic basics are sound. The children of WA are achieving well against national and international benchmarks. There is no substantial evidence that an outcomes-based education system is a threat to that performance despite the considerable furor surrounding what has become known, all too loosely, as 'OBE'. However, nor is also there good Western Australian evidence that OBE is academically beneficial.

If there is a crisis in education in WA, it is a crisis in the capacity of the WA system as it stands to provide the high quality teachers that students both need and deserve. There is a desperate need to attract high-calibre entrants into teaching and a concomitant need to establish a career structure that is likely to reward and retain the best teachers. Meeting these needs requires a complex suite of solutions. The first important step of increasing teacher pay has now been taken, and this should help to increase entry standards into teacher education. Further reform should focus on changing the process by which that pay is determined. Graduates are well paid, but a new graduate will have achieved his/her maximum salary by about the age of 30, unless s/he takes on out-of-class administrative duties. A new pay structure is needed, so that the most dedicated and creative teachers, especially those at senior levels, are adequately recognised.

Quality of education is an issue for the whole of society and must be addressed as more than an industrial issue. The future of education is too important for it to be argued over in the manner of the current adversarial industrial system. If education is to regain its status in the community then some of the sacred cows of the industrial bargaining system need seriously to be questioned and teachers and employers both need to work toward a new level of understanding.

Governments need to base their policy decisions on sound evidence and the education system as a whole should embrace a culture of research, scholarship and evidence-based decision-making, consistent with the status of teaching as a profession — in the general sense of that term.

What is needed most now is a period of stability in curriculum and structure while those with the power concentrate on solving the most pressing problem: the number and the quality of teachers. In its 2007 election campaign the Rudd Commonwealth Government promised an 'education revolution'. A revolution worth having is one based on finding and keeping good teachers. In the absence of a radical reform of Commonwealth–State relations, it is now up to the Barnett Government to take up this challenge.

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