has at last been disturbed.

My second quotation is from a piece of my own. Something like the present attack on the universities nearly happened in 1966. Sir Lennox Hewitt became head of the Universities Commission and proceeded to flood us with demands for information so detailed that it would enable his computer to cost and assess the performance of every academic in the land. I remember writing abusive responses across a form which demanded the authors, titles, publishers and retail prices of all the books we would want our history students to read in each of the next seven years.

Most of those books had not been written yet — Sir Len's impression of university life was different from the present Canberra one but no better.

Especially because of Hewitt's evident contempt for 'all that academic stodge', I was moved to write for Tom Fitzgerald's *Nation* of holy memory an account of the activity of my colleagues, faithful teachers taking equal shares of the department's teaching, determining its policies in a collegiate way, and also busy with the books that have since been found to be worth publishing in eleven languages. What I wrote then would hold as well now:

. . . I worry for my colleagues, so able, hardworked and generous. And for their students, our next teachers, researchers, writers, administrators, diplomatists and Treasury officers. It looks like a long siege, under sporadic artillery fire directed with increasing accuracy, and with increasing contempt for their valuable activities.

But before that, there was what later became a more interesting passage. I was complaining about the government replacing a distinguished scientist, as head of the Universities Commission, by a notoriously harsh axe-man from the Treasury. But I conceded that:

It is often wrong to prejudge men by their formal disqualifications. The distinguished and successful Vice-Chancellor now retiring from the University of Adelaide came to it, improbably, from the ports and harbors branch of another Civil Service. The same sensitivity, humility, capacity and will to learn, conciliatory skill and temper, and respect for the liberal and humane values of the unquantifiable part of a university's product, might do much to restore everybody's shaken trust in the present regime, and its way with its university advisers.

That retiring Vice-Chancellor was Sir Henry Basten. Shortly afterwards Hewitt left the Commission and a new Minister of Education appointed Basten to replace him. Rightly or wrongly Basten ascribed his appointment to that paragraph in *Nation*. Who knows?— perhaps the magic can work a second time. We must hope that a future government or Minister of Education will return power over university and research funding to an arms-length commission of a proper kind, and will have to appoint its members. The women members will virtually choose themselves, but for the men — why do you think this lecture has paid such tribute to the qualities of David Penington, Colin Howard and Paul Bourke?

References

1. This paper was delivered as the sixth Wallace Wurth Memorial Lecture at the University of New South Wales, 7 September 1989.
2. Postscript, 1990: So far, the worst has not happened. Because Canberra could not cope with the flood of applications, it has for the time being returned the award of all smaller grants to the universities; and the larger awards are still recommended appropriately by committees of competent researchers. But both concessions are by grace of the Minister, whose powers remain as described in this lecture.

Academic salaries in Australia, 1967 to 1990

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Between the early 1970s and the process of award restructuring in 1990, there was a substantial decline in academic salaries, in relation to prices and in relation to other wages and salaries: average community earnings, private sector earnings, international academic salaries and even — to a lesser extent — comparable salaries in the public sector.

At the same time as the decline in salaries, work loads increased, promotional opportunities were reduced and research funding became more difficult to obtain.[1] The combination of reduced rewards and greater stress has made an academic career less attractive, in itself and in relation to the growing number of alternative careers open to people with advanced university qualifications.

Thus one effect of the salary decline has been to worsen the coming shortage of academic staff in Australia. A serious shortage by the middle of the 1990s is now widely predicted.[2] The shortage is an international phenomenon (although some countries will feel it more than others)[3] and is being caused by the coincidence of increased demand for academic labour — due to enrolment growth and the spate of retirements expected in the 1990s — and insufficient supply because postgraduate work and academic careers have become less attractive options in the financial sense.

As award restructuring negotiations continued in March, Professor Brian Wilson, Chair of the Australian Vice-Chancellors' Committee and Vice-Chancellor of the University of Queensland, warned that Australian universities faced a shortage of up to 25,000 teachers by the end of the decade unless there were significant pay rises. He said that: "Careers in academia are much less attractive than they were, say, 20 years ago."[4]

Award restructuring was being negotiated between the academic unions and the Australian Higher Education Industrial Association (the Vice-Chancellors' employer organisation) as this issue of AUR went to press. Award restructuring offers the prospect that some part of the lost salary ground will be restored. It appears that the increase in academic salaries will be significantly greater than the award restructuring minimum of 3 per cent plus 3 per cent.

Depending on whether the union or the employer view prevails, and incorporating the first 3 per cent for award restructuring already awarded last October, academics could receive increases ranging from 23.2 per cent at the bottom of the existing Tutor scale, to 12.3-16.6 per cent for Senior Lecturers and 12.7-32.7 per cent for Professors, as well as a new career structure.

From the point of view of academic staff, this is a substantial gain. Whether the salary increases and new career structure will be enough by themselves to restore relativities and alleviate the future shortage problem is another question. It remains to be seen whether the salary and career framework established in the award restructuring process is a 'one-off' change, or the beginning of a longer term process of salary improvement that will further restore the economic standing of the profession. It also depends on what happens with award restructuring elsewhere in the work force.

This article looks at the long term trends, with emphasis on analysis of the decline in academic salaries between the early 1970s and the end of the 1980s. Salaries are compared to price levels and community earnings, to traditional public sector comparators in the research, management and professional fields, and to academic salaries throughout the English speaking world.

Data used

Movements in the base level of academic remuneration are examined — award salaries, as determined by the successive Inquiries into Academic Salaries until 1976, the Academic Salaries Tribunal until 1984, and thereafter the Commonwealth Arbitration Commission (now known as the Industrial Relations Commission). Salaries have also been periodically adjusted in National Wage Cases. A small number of academics now receive non-salary benefits on top of their base salary. We lack summary data on such benefits, but the incidence is probably still too small to disturb the longitudinal comparisons. Unlike the situation in the USA, these non-salary benefits seem to be almost entirely confined to senior levels, and are usually specific to a small group of disciplines. Non-salary benefits are not included. Salary loadings, another recent phenomenon, are not included either.

Gross salaries rather than net salaries are used. The after-tax comparison has been discarded (with some regret) because it is not a standardised academic income: non-salary income, tax and rebate status vary. Gross salary is a recognisable indicator which is common across the whole profession.

Academic salaries and price movements

Academic salaries peaked in real terms in 1973, when there was a shortage of staff and a bipartisan consensus on the need to increase public expenditure on education. Since the implementation of the increases recommended by Justice Campbell from 1 January 1973, the maximum Senior Lecturer salary has fallen by **26.5 per cent** in real terms as measured by the Consumer Price Index. If the value of academic salaries had been maintained in real terms, the Senior Lecturers' maximum salary would have been fixed at $67,346 per year last October, rather than the level of $49,529 which was actually adopted. That is a difference of $17,817 per year.

Since 1973 Professors' salaries have fallen by 26.9 per cent and Readers' by 25.7 per cent. At the bottom of the Lecturer range the decline is 20.9 per cent; for the bottom of the Tutor range it is less: 12.1 per cent. Table 1 shows the details.

Tutors and junior Lecturers lost less than their more senior colleagues because of the compression of relativities that was a feature of Australian wage fixation in the second half of the 1970s — a result of plateau wage indexation decisions, and decisions based on flat dollar amounts rather than percentage increases.

Because 1973 was the highpoint of academic salaries, the real terms decline is less if any other point of comparison is used. For example, following the 1976 Campbell Inquiry there has been a fall in real terms of 21.9 per cent at the top of Senior Lecturer and 23.1 per cent for Professors. Since October 1983, the first National Wage adjustment under the Hawke Government, there has been a loss in real terms of 9.6 per cent for Professors, 8.9 per cent at the top of Senior Lecturer and 7.4 per cent at the bottom of the Lecturer range. Table 2 sets down the history of the maximum Senior Lecturer salary, using some key points of decision in the history of academic salary fixation.

In terms of living standards, the most accurate indicator is not trends in the salary at each level successively established in the wage fixation process, but trends in the actual salary received in each financial year — embracing any changes in the salary rates that have occurred during the year. This provides a record of dollars in the pocket.

Using this latter measure, the highpoint of academic salaries was not 1972-1973, but 1975-1976. While the early 1970s were characterised by large but infrequent adjustments, in the mid-1970s salary adjustments were smaller, regular and frequent. Quarterly wage indexation prevailed for a time.

TABLE 1
Academic salaries in real terms, 1973 & 1989

	Salary as at 26 Oct 1989 (3 per cent)	Salary as at 1 Jan 1973 (Campbell Inquiry) 1989 Prices	Difference between 1973 and 1989
	$	$	%
Tutor	23414	26648	-12.1
Lecturer			
Bottom	32197	40698	-20.9
Top	41841	56300	-25.7
Senior Lecturer			
Bottom	42703	57656	-25.9
Top	49529	67346	-26.5
Reader	55818	75098	-25.7
Professor	65837	90118	-26.9

Source: Consumer Price Index, Australian Bureau of Statistics, Catalogue Number 6401.0; FAUSA salary files.

TABLE 2
Salary of Senior Lecturer (Maximum) in real terms 1967 to 1989

Date	Current Salary	Salary in constant Sept 1989 prices	Index numbers for salary in constant prices 1973 = 100.0
	$	$	%
Negotiated settlement 1.7.67	8750	53463	79.4
Eggleston Inquiry 1.1.70	10500	59783	88.8
Campbell Inquiry 1.1.73	**13900**	**67346**	**100.0**
Campbell Inquiry 31.7.76	21218	63458	94.2
National Wage Case 27.6.79	25476	58494	86.9
Post-indexation 10.8.82	35077	58314	86.6
National Wage Case 4.11.85	42588	57035	84.7
First 3 per cent for award restructuring 26.10.89	49529	49529	73.5

All the dates used here are operative dates of particular academic salary increases — that is, they are salary highpoints in relation to prices.

TABLE 3
Salary of Senior Lecturer (maximum)
1966-1967 to 1988-1989

Financial Year	Senior Lecturer (maximum): pay during year, current prices	Senior Lecturer (maximum): pay in constant 1988-1989 prices	Index numbers for salary in constant prices (1975-1976 = 100)
	$	$	
1966-1967	7600	44345	76.3
1967-1968	8750	49364	85.0
1968-1969	8750	48202	83.0
1969-1970	9625	51361	88.4
1970-1971	10815	55045	94.7
1971-1972	11141	53097	91.4
1972-1973	12608	56766	97.7
1973-1974	14308	57019	98.1
1974-1975	16918	57718	99.3
1975-1976	**19232**	**58099**	**100.0**
1976-1977	21851	57970	99.8
1977-1978	23596	57174	98.4
1978-1979	24263	54753	94.2
1979-1980	26032	53346	91.8
1980-1981	29246	54778	94.3
1981-1982	30994	52583	90.5
1982-1983	34618	52672	90.7
1983-1984	37089	52787	90.9
1984-1985	39301	53652	92.3
1985-1986	42046	52960	91.2
1986-1987	43728	50371	86.7
1987-1988	44258	47504	81.8
1988-1989	47106	47106	81.1

Frequent adjustments best maintain living standards. Table 3 shows the trend in Senior Lecturers' remuneration, by financial year. The trends here can be considered to be representative of all salaries above Tutor.

It can be seen from Table 3 that for a period of six years in the early and mid-1970s academic salaries stayed at a relatively high level. In the late 1970s, partial wage indexation under the Fraser Government cost a Senior Lecturer on the maximum point 6.8 per cent of salary in real terms. The gains made in the immediate post-wage indexation period (1980-1981) were soon eliminated by inflation. After 1985-1986 there was a sharp drop of more than 10 per cent over three years, as in much of the workforce.

Since 1975-1976 the total annual salary received by a Senior Lecturer has declined by 18.9 per cent in real terms. In the last financial year (1988-1989), before any award restructuring increases had been received, Australian academics received less wages in real terms than they did in 1967-1968.

Academic salaries and the salaries of comparable professionals

Is this decline particular to academics or is it a wider phenomenon? What have been the experiences of CSIRO scientists, senior public service administrators and managers, public service engineers and others? These are the traditional comparators of academics in salary fixation. Have academics lost ground in relation to these groups?

These comparator salaries have played a specific and traditional role in academic salary fixation since the establishment of national academic salary rates in 1964. Mr Justice Campbell said in 1973:

> *4.17 Despite the differences which exist in qualifications, skills and responsibilities in the different occupations, the most appropriate fields on which to base comparisons of salary movements over time seem to be research organisations (in particular the CSIRO), the Second and Third Divisions of the Commonwealth Public Service (distinguishing between clerical/administrative and professional classifications), similar levels in the State public services and State education departments (in respect of teachers' salaries). Most of the parties appear to have accepted the relevance of these comparisons.*[5]

The most significant comparisons have been those at the main points of entry to the profession. Justice Campbell said in 1973 that at year one stage, "salaries of university tutors need to stand in reasonable proximity to those of four-year trained teachers", and that "I am satisfied that, at the point of entry into CSIRO research scientist posts and university science lectureships, recruitment is from a common pool and substantially the same qualifications and levels of ability are required". This nexus was to academic salaries as a whole, including those in non-science disciplines, because "recruitment standards overall in universities are reasonably uniform."[6] As Sir Richard put it in 1964:

> *. . . it seems to me inescapable that the minimum salary for a lecturer on the permanent staff should be raised to a level approximately equivalent to the lowest salary of a research scientist in CSIRO. If this is not done, the recruitment of scientists as lecturers must inevitably suffer from the attraction of the higher salary offered to research scientists in the research institutions.*

The relationship between the salaries of Senior Lecturers, Readers and Professors and comparators in the CSIRO and the Commonwealth Public Service has not been quite as strong, but these comparator salaries were often cited in the specific Inquiries into academic salaries and later, the decisions of the Academic Salaries Tribunal between 1976 and 1985. As Mr Justice Campbell said in 1976, the other salaries have been treated as "broadly comparable" to academic salaries. Mr Justice Ludeke acknowledged in 1982 that "academic staff cannot be isolated from developments that cause salary movements in the community", and his 1984 Academic Salaries Tribunal cited the level of comparator salaries as a basis for determining quantum — although as the decision showed, he honoured this informal nexus in the breach rather than in the observance.

Comparing recruitment level salaries, between January 1973 and May 1989 the minimum salary of a university Lecturer fell by 21.4 per cent. Much the same happened to the traditional comparator salaries; the fall was not quite as great. The minimum level of pay received by a CSIRO Research Scientist fell 16.4 per cent, the maximum received by a Commonwealth Public Service (CPS) Engineer fell by 16.7 per cent and the maximum accruing to the top of Class 6 in the administrative grades of the CPS fell by 18.7 per cent.

Similarly, the Tutor (minimum) salary lost some ground relative to the first year salary paid to four-year-trained teachers in NSW, the traditional Tutor comparator. In 1973 the Tutors' salary was pegged 1 per cent ($50) higher than that of the NSW teacher. Subsequently both experienced decline in real terms, but after 1980 — which saw a major salaries strike in the NSW teaching service — the NSW teachers' salary moved above the level of the Tutors' salary. This has been a considerable anomaly, because the Tutor is required to operate at a more advanced level of academic training; the anomaly is being corrected in the award restructuring process. Until award restructuring, the Tutor (minimum) salary had fallen by 13.1 per cent in real terms while the NSW teachers' salary had declined by 8.7 per cent.

The picture is similar for the other academic grades. In the case of Senior Lecturers, the traditional comparators have not declined by as much as 26.9 per cent, but the order of magnitude is similar: CPS Engineers 21.9 per cent; CSIRO Principal Research Scientists 21.3 per cent; CPS top of administrative class 22.0 per cent. If the Senior Lecturer salary had been pegged to the salary of a Class 5 CPS Engineer it would have been $2003 higher in mid-1989. If the 1973 parity with the Engineer had been maintained, the Senior Lecturer would have been receiving $3323 more.

If the 1976 rather than 1973 is chosen as the point of comparison, the decline relative to the traditional comparator salaries is slightly less, but it is similar. For example, compared to the 1973 CPS Engineer the 1973 Senior Lecturer salary declined by 6.5 per cent; when the same comparison is made based on 1976 levels, the relative decline is 4.3 per cent.

Table 4 looks at the longitudinal trends in the Senior Lecturer salary, compared to the traditional comparator salaries.

Table 4 shows that the four salaries stayed within 3 per cent or so of their 1973 relationship, until 1979. After wage indexation collapsed in 1980, academic salaries lost some ground in relation to the others. By 1989 the other three salaries had almost exactly maintained their 1973 relativity to each other, but the Senior Lecturer had fallen about 5 per cent or more behind.

Professors and Readers lost a similar quantum, relative to the traditional comparators. Professors have usually been compared to CSIRO Chief Scientist Level 1 and Level 3 of the old Second Division in the managerial echelons of the CPS. Since 1973 the Professors' salary has fallen by 27.4 per cent in real terms, the CPS salary by 23.5 per cent and the CSIRO salary by 22.2 per cent. While the Readers' salary has fallen by 26.2 per cent, the salary received at Level 1 of the CPS Second Division has fallen by 23.0 per cent.

Table 5 summarises the relationship between academic salaries and traditional comparator salaries, using the 1 January 1973 relativity as a benchmark. A decline of 6.0 per cent of the Lecturers' salary means that this salary was 6.0 per cent lower than it would have been if 1973 relativities had been maintained. In 1973 Lecturers at the minimum point of the scale earned $8400 a year while CSIRO Research Scientists' minimum salary was $7967 a year, 94.8 per cent of the level of Lecturer. In 1989 Lecturers began at $31259 and CSIRO Research Scientists at slightly more, $31525 (100.9 per cent). In this category, academics had lost 6.0 per cent relative to CSIRO Scientists.

However, it is important not to lose sight of the fact that all these public sector salaries have experienced a major fall in real terms, a fall that overshadows the much smaller changes in the relativities between them. The downgrading of advanced professional work is not something unique to universities. For this reason, it is hard to rectify quickly. The whole public sector has experienced decline in real salary levels since public sector cutbacks began in the mid-1970s, although average community earnings have increased.

TABLE 4
Salaries of Senior Lecturer (maximum) and Traditional Comparators — 1967 to 1989
Current prices, and index numbers for constant prices

Date	Senior Lecturer (maximum)	CPS Engineer Class 5 (maximum)	CPS 3rd Division Class 11 (maximum)	CSIRO Principal Research (minimum)
	$	$	$	$
1.7.67	8750	8790	8375	8190
	79.3	**81.8**	**84.1**	**81.2**
1.1.70	10500	10496	9747	9847
	88.7	**91.0**	**92.2**	**91.0**
1.1.73	13900	13543	12551	12712
	100.0	**100.0**	**100.0**	**100.0**
31.7.76	21218	21155	19496	19946
	94.2	**96.4**	**95.9**	**96.9**
26.6.79	25476	25403	23464	23247
	86.9	**88.9**	**88.6**	**86.7**
10.8.82	35077	35300	35310	33300
	86.6	**89.5**	**96.1**	**89.9**
4.11.85	42588	44460	39918	41942
	84.7	**90.8**	**87.9**	**91.2**
15.5.89	48086	50089	46370	47378
	73.1	**78.1**	**78.0**	**78.7**

Source: Records of FAUSA, Association of Professional Engineers of Australia, CSIRO Officers' Association, Public Sector Union.
Salary in current prices, and **index numbers for salary in constant prices:** 1.1.73 = 100.0. This 1989 figure is for May, rather than October as in a previous table.

Why the relative decline has occurred

However, the decline relative to the traditional public sector comparators is easier to rectify. Overall, academics have lost 3 to 8 per cent, depending on classification, relative to the traditional comparators. When and how did this relative decline occur?

Academic salaries moved more or less in parallel with those of the traditional comparators, both in the 1973 to 1980 period, and in the period after 1985. It was in the years 1980 to 1985 that the slippage occurred.

In that period (FAUSA's last years in the Academic Salaries Tribunal) the 1978/1980 work value wage round and the post-indexation 1981/1982 metal trades rounds were making their way through the public sector.

Taking these rounds together, academics did not receive the full community movement, although most other public sector employees did (see Table 6).

This was as a result of successive 1981 to 1984 decisions in the Academic Salaries Tribunal. Justice Ludeke allowed the anomaly to arise, and despite repeated submissions the anomaly was not corrected. The FAUSA/FCA/NSW Teachers' Federation submissions of the time are still available; they accurately identified the community wage movements of the period, and claimed accordingly.[8]

The story begins with the 1981 work value decision. Due to delays in commencement and to the exhaustive nature of the case, academics received their late 1970s work value round increases much later than most of the rest of the workforce. The first work value increase was received in transport in 1978. Academics received an interim 4 per cent in November 1980, but did not receive the balance of the work value standard until 27 October 1981, backdated to November 1980. The total work value standard was 5 to 6 per cent. Surprisingly, Justice Ludeke then awarded 4 per cent **more** than the then standard: the full increase received by academics to that point was 10.0 per cent.

This gave academics a temporary salary advantage over many in the public sector. But Justice Ludeke's decision did not turn out to be as benevolent as it might have seemed at first. Before the 10.0 per cent decision was handed down, the wage indexation system collapsed and two new community-wide wage rounds started to take shape, led by the ACTU in the metal industry. One result was that **despite** the fact

that the balance of academics' 10.0 per cent was backdated, it was possible to argue that this balance was, technically, a post-indexation movement.

The first metal trades increase was fixed at the level of 12 to 13 per cent, followed by another 6 to 7 in the second of the rounds (known as the 'mid term adjustment'). This first round was awarded in the metal industry on 18 December 1981. Not long before there had been an equivalent adjustment in the Commonwealth Public Service, following a major wage dispute there. In 1982, the next salary case after the work value decision, academics might have expected to receive 12 or 13 per cent — perhaps minus the extra 4 per cent Justice Ludeke had already awarded, above the level of the work value round — depending on whether he thought that academic work value had increased more than work value in other sectors.

The academic unions claimed 12 per cent, arguing that Justice Ludeke had shown that he wanted academic salaries to be pegged 4 per cent higher in relation to the traditional comparators. Justice Ludeke rejected this argument and said that the earlier 10.0 per cent awarded to academics was "sufficient for all purposes" and "directly relevant to the time at which it was made".[9] One effect of this position was that the last 5.8 per cent of the 10.0, which fell in the post-indexation period, could be treated as a metal trades round movement — though this would mean that academics would receive less than the community standard for work value.

In response to the academic unions' claim for 12 per cent, Justice Ludeke granted 7 per cent. This would have made up all but about 1 per cent of the gap with the traditional comparators, but even before the 7 per cent was awarded to academics in August 1982 the Commonwealth Public Service had received the **second** metals round (6.6 per cent), and other comparators followed soon after. Justice Ludeke then failed to grant the second metals round of 6 to 7 per cent to academic staff.

Almost two years later he gave academics 5 per cent in response to the academic unions' claim for 8 per cent to restore parity with the traditional comparators. As well as having to wait almost two years longer than the traditional comparators and suffering a major loss in total income as a result, academics were now 3.0 per cent or so behind.

A final two per cent was lost after the Academic Salaries Tribunal was abolished, when Justice Maddern, in what was then the Commonwealth Arbitration Commission, refused to grant academics the 1.8 to 2.0 per cent anomalies round which was standard in the public sector. This anomalies round had been received by the traditional comparators. Justice Maddern found it easier to refuse it to academics because Justice Ludeke had already broken the informal nexus between academic salaries, CSIRO and the CPS.

TABLE 5
Change in salary position of academics relative to traditional comparators 1973 to 1989

Salary decline 1973 to 1989, compared to the 1973 relativity, in relation to:	CSIRO equivalent	CPS Engineer equivalent	CPS 2nd/3rd Division equivalent	NSW Teacher
Tutor (min)	n.a.	–7.6%	n.a.	–4.8%
Lecturer (min)	–6.0%	–5.3%	–3.4%	n.a.
Senior Lecturer (max)	–7.2%	–6.5%	–6.4%	n.a.
Reader	–4.1%	n.a.	–4.9%	n.a.
Professor	–6.7%	n.a.	–5.1%	n.a.

n.a. means not applicable. Supporting data is available in full on request from Simon Marginson at the FAUSA Office, 25 Palmerston Crescent, South Melbourne, VIC, 3205. Comparison is 1 January 1973 to 15 May 1989.

TABLE 6
Summary movements outside National Wage Cases, Senior Lecturer and traditional comparators 1980 to 1985

1. Senior Lecturer in higher education (maximum)		
4.0% + 5.8% (10.0%)	7 November	1980
7.9%	10 August	1982
2.0%	17 April	1984
3.0%	5 June	1984
	compound total	**23.4%**
2. CPS Engineer Class % (maximum)		
5.6%	31 July	1980
12.5%	28 January	1982
7.0%	23 September	1982
1.8%	30 August	1985
	compound total	**29.4%**
3. CPS top of Third Division: Level 11 (maximum)		
6.0%	22 May	1980
13.2%	22 October	1981
6.6%	2 August	1982
2.0%	24 May	1985
	compound total	**30.5%**
4. CSIRO Principal Research Scientist (minimum)		
5.6%	September	1980
12.4%	28 January	1982
7.0%	23 September	1982
1.8%	5 September	1985
	compound total	**29.3%**

Table 6 summarises the respective salary movements between 1980 and 1985.

Academic salaries and other professional earnings

This decline in academic salaries relative to comparator public sector salaries is dwarfed by the decline in relation to some private sector salaries. The recent boom in accountants' salaries — now said to be waning[10] — is one example. We do not have longitudinal data on accountants' salaries, but some recent private/public sector salary comparisons for engineers and scientists are instructive.

The annual remuneration survey conducted for the Association of Professional Engineers of Australia (APEA) found that in the year to December 1989 engineers in the private sector recorded average salary increases of 10.3 per cent, while public sector engineers' salaries rose by 5.5 per cent. The average age of private sector engineers was 3 years younger than that of public sector engineers, but the total remuneration of public sector employees at an average of $50160 was well below the average of $54843 in the private sector. Further, in the private sector 40.7 per cent of professional engineers were provided with a motor vehicle as part of their remuneration package, compared to 13.3 per cent in the public sector.[11] Only a small number of academics were included in the survey as academic engineers tend to be members of the academic unions rather than of the APEA.

The recent annual salary surveys by the Royal Australian Chemical Institute have produced similar results. Between 1986 and 1989, the money salaries received by chemists working as employees in the private sector (approximately 50 per cent of all the chemists surveyed) rose by 23.5 per cent. Over the same time period, chemists working in universities (12 per cent of respondents) experienced salary rises of only 8.6 per cent, a loss in real terms of 11.3 per cent.[12] Table 7 shows the details.

Table 7 shows that in the 1986 to 1989 period academic salaries rose considerably more slowly than Average Weekly Earnings. We will now look at the longer term comparison between academic salaries and average community earnings.

Academic salaries compared to average community earnings

Of the community earnings series compiled by the Australian Bureau of Statistics, the most relevant to academic salaries is the Average Weekly Ordinary Time Earnings (AWOTE) series. It excludes overtime earnings. The data here are for full-time adult male earnings; data for female earnings are not available before 1981. (There is a major break in the series in 1981: after that AWOTE includes managerial and executive earnings and because of this factor, and the changeover to survey-based collection, the recorded level of AWOTE jumps by several per cent).[13]

AWOTE data is available from 1974. In October 1974 the maximum salary of a Senior Lecturer was 250.9 per cent of the level of Average Weekly Ordinary Time Earnings (AWOTE). In 1989, before award restructuring began, the maximum Senior Lecturer salary had fallen to 173.7 per cent of AWOTE.

During the second half of the 1970s AWOTE rose in real terms, fell again but finished the decade at the mid-1970s level. Over the same period, academic salaries lost 11.2 per cent in real terms. During the Hawke years both gained about 5 per cent in real terms, and then fell, but the decline of academic salaries was much sharper.

Senior Lecturer maximum fell by 25.4 per cent in real terms between October 1974 and June 1989. Overall, AWOTE **rose** by 12.1 per cent — although some of this increase is due to the effects of the changeover in the definition and methods of collection of the AWOTE data. Table 8 shows that community wages have risen while academic salaries have languished:

Even allowing for changes in the methods of collection of AWOTE and other alterations in its field of coverage throughout its history, the downgrading of academic salaries is very striking.

A decline of one third relative to Average Weekly Ordinary Time Earnings — as Table 9 reveals — is a large decline indeed over only 15 years.

For other academic salary categories, the decline relative to AWOTE is only slightly less: 30.3 per cent for Professors, 31.1 per cent for Lecturers and 29.9 per cent for Tutors. In 1974 the bottom of the Tutor range was 116.6 per cent of AWOTE. In May 1989 it was only 81.8 per cent.

TABLE 7
Salaries received by chemists, various categories 1986 to 1989

	Salary in 1986	Salary in 1989	Salary in 1989 1986 = 100.0
	$s	$s	Index Numbers
Private industry			
Proprietors	49750	60000	120.6
Employees	34000	42000	123.5
Higher education			
Universities	42000	45600	108.6
CAEs	38100	41100	107.9
All Chemists	35300	41600	117.8
Consumer Price Index (1980-81 = 100.0)	153.0	186.0	121.6
Average Weekly Earnings	431.6	517.7	119.9

Source: Royal Australian Chemical Institute.

TABLE 8
Senior Lecturer (maximum) Salary Compared to Average Weekly Ordinary Time Earnings (1)

Date	Senior Lecturer (max)	AWOTE	Senior Lecturer (max) in real terms	AWOTE in real terms
	$s	$s	Index numbers 16.10.74 = 100.0	
16.10.1974	17900	6862	100.0	100.0
31.07.1976	21218	8845	96.3	104.8
26.06.1979	25476	11036	88.8	100.3
10.08.1982	35077	17439*	88.5	114.8*
6.10.1983	36585	19249	82.6	113.3
4.11.1985	42588	21895	86.6	116.1
15.05.1989	48086	27676	74.6	112.1

* affected by the introduction of a new definition and method of collection for the AWOTE series. See ABS 6302.0, various years.

TABLE 9
Senior Lecturer (maximum) Salary Compared to Average Weekly Ordinary Time Earnings (2)

Date	Senior Lecturer (max) salary as a proportion of AWOTE	16.10.1974 proportion of AWOTE = 100.0
	%	
16.10.1974	260.9	100.0
31.07.1976	239.9	92.0
26.06.1979	230.8	88.5
10.08.1982	201.1	77.1
6.10.1983	190.1	72.9
4.11.1985	194.5	74.6
15.05.1989	173.7	66.6

Australian academic salaries relative to international academic salaries

Relative to community wages, the salary

position of academics has declined in many parts of the developed world since the rate of growth of public spending in education levelled off in the mid-1970s. Nonetheless, relative shifts between countries are important.

For example if one nation experiences a long term improvement in the relative academic salary position, it is likely to attract a somewhat stronger group of academics over time. The converse is that when a nation's relative position slips in the long term, it is likely to experience more of a 'brain drain' of its home-grown talent and will be less attractive to overseas academics.

Relative attractiveness becomes a very important issue when there is a generalised international shortage, as will be the case in this decade. A nation whose relative academic salary position is declining is likely to see its own shortage of academics worsened because too much of its scanty supply will be attracted overseas to alleviate someone else's shortage.

The trends in international relativities that are most significant are changes in relative purchasing power. Fluctuations in exchange rates have little effect on academic choices about where to live and work. As Norris and Cove pointed out in their 1977 comparison of UK and Australian academic salaries, when a change in the exchange rate takes place, salaries will increase/decrease "by the full amount of the exchange rate shift only if all goods and services in the two countries are traded on the international market".[14] Further, academic salaries are not like property income or share dividends. The greater part of salaries are spent in the country of residence.

To assess changes in the economic standing of academics in each country, it is necessary to measure the respective relationships between academic salaries on the one hand, and consumer prices and average community wages on the other. The question thus posed is 'in which country have academic salaries held up best over time, in relation to prices and to community wages?'. This form of comparison is more concrete than the historical relationship between different international salaries in Australian dollar terms, incorporating the exchange rate movements. In deciding whether or not to take a job in another country, the most relevant economic issue is the earning power of the academic salary in that country.

Having said all that, the **current** academic salaries in Australia, UK, New Zealand and the USA are introduced and briefly compared in Table 10.

TABLE 10
Current academic salaries in four countries
Australian dollars, 1988-89

Australia	UK	NZ	USA*
Tutor (min) **21931**	Lecturer A (min) **21510**	Assistant Lecturer (min) **22195**	d.n.a.
Lecturer (min) **30463**	Lecturer B (min) **32937**	Lecturer (min) **26774**	d.n.a.
Senior Lecturer (max) **47106**	Senior Lecturer (max) **53998**	Senior Lecturer (max) **48174**	Senior Lecturer (average) **55033**
Professor **62765**	Professor (average) **62840**	Professor (average) **65316**	Professor (average) **90066**

d.n.a. indicates data not available. US data is average total remuneration, including non-wage benefits — almost one-fifth of total remuneration on average. The other salaries are centrally fixed and the comparison between these three is closer to being a like with like one. The US data relates to universities with substantial doctoral programs, the group most similar to the universities in the other countries. It includes all remuneration received for normal work during the standard academic year (81.8 per cent of the calendar year). Thus it excludes summer teaching, stipends, and exrta loads.

Salaries are those paid during the 1988-89 financial year, incorporating changes in rates over that period. Exchange rates are as at 17 April 1990. 1 Australian dollar = 0.4655 pounds sterling, 1.3103 NZ dollars and 0.7610 US dollars.

Sources: US data from **Academe**, the journal of the American Association of University Professors. UK data and NZ data from the Association of University Teachers of the UK and the Association of University Teachers of NZ respectively.

TABLE 11
Academic salaries in Australia, United Kingdom and New Zealand
Real terms in each country, 1 January 1973 = 100.0
1970 to 1989

Date	Australia Senior Lecturer (max)	United Kingdom Lecturer (max)*	New Zealand Senior Lecturer (max)
1.07.1967	79.3	84.2	71.1
1.01.1970	88.7	90.0	65.6
1.01.1973	100.00	100.00	100.00
31.07.1976	94.2	81.2	83.2
1.07.1979	86.9	83.7	86.1
10.08.1982	86.6	84.2	87.4
4.11.1985	84.7	83.7	89.0
1.07.1987	75.4	90.4	78.3
1.06.1989	73.1	90.4	88.0

* In UK, figures are for the salary adjustment nearest to the date given here. Price measures used are Australian Consumer Price Index, UK Retail Price Index and NZ Consumer Price Index.

Remuneration appears much higher in the USA — a reflection of the strength of the US dollar relative to the Australian dollar, as well as of the relative levels of academic pay. But the US data only covers academics' income during four fifths of the calendar year — US academics who receive additional income from summer teaching, outside the standard academic year, have much higher incomes than their Australian counterparts.

The UK and NZ out-pay Australia in most categories. In the case of the UK, the exchange-rate based relative position has shifted very greatly since 1976, when Norris and Cave found most Australian salaries were almost twice those of the UK in Australian dollar terms. The main reason for the changed position is long-term changes in exchange rates.

We turn now to the more relevant long-term trends in the respective price/salary relativities. First, the **Australian/UK comparison**. In real terms, UK salaries peaked at the 1 October 1972 adjustment, three months before the highest point reached by Australian academic salaries in real terms. From 1974 on, UK salaries declined sharply to the end of 1977 (not shown in Table), losing a massive 22 per cent in real terms in three years. For the first half of the 1980s the UK salaries fluctuated more than 15 per cent below their peak. But from 1987 a definite recovery occurs. In 1988 (not shown) the maximum salary of a Lecturer — the point where most of the UK academic profession end their upward progression — was only 6.3 per cent below the 1972 peak. This is a marked contrast in Australia, where the 1989 salary level was the lowest for 20 years and by June 1989 salaries were 26.9 per cent below the peak reached in 1973.

In relation to the **Australian/New Zealand** comparison, New Zealand salaries also peaked at the beginning of 1973, and then followed the UK pattern. There was a sharp fall by almost 17 per cent to 1976. Fluctuations followed and the salaries fell by almost as much as Australia's but there was a definite recovery in 1988 and 1989. In mid-1989 the maximum Senior Lecturer salary was 12 per cent below the 1973 level, less than half the total decline experienced by Senior Lecturers in Australia.

Table 11 shows the comparison since 1970 for the standard academic salaries in each country: Senior Lecturer maximum in Australia and New Zealand, and Lecturer maximum in the UK.

In the 1970s, Australian academics experienced similar pay patterns to those of their UK and New Zealand counterparts. It is in recent years where divergence has occurred. In the second half of the 1980s when the UK and New Zealand salaries began to catch up the lost ground, Australian salaries continued to fall.

The result is that Australian salaries have declined in relative terms. Table 11 shows that between 1970 and 1989, Australian salaries declined by 26.9 per cent while UK salaries declined by 9.6 per cent and NZ salaries declined by 12.0 per cent. Using ratios between the index numbers in Table 11, we can calculate the magnitude of this relative decline.

In terms of purchasing power, between 1973 and 1989 Australian academic salaries lost 19.1 per cent in relation to the UK, and 16.9 per cent in relation to New Zealand. This is a significant change.

How have UK and New Zealand academics fared in relation to average community earnings? Have they experienced the sharp decline in relative position that Australian academics have experienced?

In the UK the trend has been not dissimilar to the Australian one. Between October 1974 and April 1989, UK average earnings rose by 29.1 per cent in real terms, while the maximum salary of a Lecturer rose by 0.7 per cent in real terms. Relative to average earnings, UK academic salaries have lost 21.9 per cent. The corresponding loss for Australian academic salaries is 33.4 per cent.

However, if the point of comparison is 1972 then UK academics have lost 35.2 per cent in relation to UK average earnings — similar to the size of the Australian decline.

In New Zealand, average earnings figures are available only since 1978. Between April 1978 and February 1988, the maximum salary of a Senior Lecturer lost 15.3 per cent relative to average ordinary time earnings. Unlike the UK and Australia, average earnings in New Zealand have fallen slightly in real terms over the last ten years.[15]

TABLE 12
Changes in academic salaries in real terms: Comparison* of Australia and USA, index numbers, 1966-67 to 1988-89
1972-73 = 100.0

Year	USA Average academic salary, real terms	Australia Senior Lecturer (max) over year, real terms	Relativity between USA and Australia Australian salary as a proportion of USA salary.
	1972-73 = 100.0	1972-73 = 100.0	1972-73 = 100.0
1966-67	95.6	78.1	81.7
1967-68	98.4	87.0	88.4
1968-69	99.8	84.9	85.1
1969-70	99.8	90.5	90.7
1970-71	100.1	97.0	96.9
1971-72	99.9	93.5	93.6
1972-73	**100.0**	**100.0**	**100.0**
1973-74	96.5	100.4	104.0
1974-75	91.9	101.7	110.7
1975-76	90.9	102.4	112.7
1976-77	90.9	102.1	112.3
1977-78	88.9	100.7	113.3
1978-79	85.9	96.5	112.3
1979-80	81.2	94.0	115.8
1980-81	79.1	87.7	110.9
1981-82	79.3	92.6	116.8
1982-83	80.9	92.8	114.7
1983-84	81.7	93.0	113.8
1984-85	83.9	94.5	112.6
1985-86	86.4	93.3	108.0
1986-87	89.5	88.7	99.1
1987-88	90.2	83.7	92.8
1988-89	91.4	83.0	90.8

*The comparison is not exact: Australian figures are for top of Senior Lecturer range in universities; USA figures are average academic salaries in all tertiary institutions, as received during the standard academic year (81.8 per cent of the calendar year). Non-salary remuneration in the USA and Australia is excluded. US Consumer Price Index used to measure price movements in the USA.

Table 12 provides the full Australian/US salary comparison since 1966-67. Between 1972-73 and 1981-82, Australian academic salaries strengthened their position in comparison to the USA. After 1981-82 US salaries improved in real terms, Australia's declined and relativities turned around very quickly indeed. **Australia's relative position vis a vis the US declined a massive 22.3 per cent in only eight years.** Once again, the erosion of the relative salaries position occurred mainly in the last four years.

Finally, it is instructive to look at these respective international trends simultaneously. Tables 13 and 14 are not exact comparisons of like with like. The US and Canadian salary data is based on averages of the market rates for all academics. The NZ, and Australian data is for Senior Lecturer maximum and the UK data is for Lecturer maximum.

This means that between 1975-76 and 1987-88, Australian academic salaries lost 24.1 per cent in relation to the UK, 17.5 per cent in relation to the USA, 11.3 per cent in relation to New Zealand and 8.6 per cent in relation to Canada.

Table 13 confirms what has already been

TABLE 13
Academic salaries in real terms
Australia, UK, NZ, USA, Canada
1975-76 to 1987-88

Academic salaries in real terms	1975-76	1979-80	1983-84	1987-88
Australia	100.0	91.8	90.8	81.7
UK	100.0	97.4	98.8	107.7
NZ	100.0	99.5	94.9	92.1
USA	100.0	89.3	89.9	99.2
Canada	100.0	93.8	91.3	89.4

Northern American data does not include non-salary benefits.
Source: Canadian data from David A. Balzarini, 'The fading economic status of the academic', *CAUT Bulletin*, April 1989, Pages 5-7.

TABLE 14
Academic salaries compared to average earnings
Australia, UK, NZ, Canada
1975-76 to 1987-88

Average earnings, real terms	1975-76	1979-80	1983-84	1987-88
Australia	100.1	100.0	112.9	112.0
UK	98.3	100.0	107.1	122.2
NZ	n.a.	100.0	102.7	97.8
Canada	97.4	100.0	99.9	96.6
Ratio of academic salary (see Table 13) to average earnings				
Australia	108.7	100.0	82.4	80.4
UK	104.4	100.0	94.7	90.4
NZ	n.a.	100.0	94.5	93.0
Canada	109.5	100.0	97.5	98.7

n.a. indicates data not available. Note also that no average earnings data for the USA was available. For full supporting data and qualifications to the Table, contact Simon Marginson at FAUSA.

gleaned from each of the country by country comparisons. Until award restructuring, **academic salaries in Australia were at a low point compared to those of the rest of the Enlish speaking world**. The later 1980s saw academic salaries in the UK, the USA and New Zealand recover some ground. In Australia, where the fall in real terms was the highest, the recovery — only just now taking place — was the last.

Table 14 should be interpreted with caution because the definition of average earnings is different in each country. There is a common pattern of decline in comparison to average earnings — least in Canada where average earnings fell in real terms, greater in the UK because average earnings rose sharply, and greatest in Australia where the severe decline in academic salaries coincided with average earnings that rose significantly in real terms.

Conclusion

However the problem is viewed, academic salaries were in a parlous state by 1989. Relative to prices the loss to October 1989 since the high point of 1973 ranged from 12.1 per cent (Tutors) to 26.5 per cent (Senior Lecturers) and 26.9 per cent (Professors). Compared to the 1974 relativity with average ordinary time earnings, Senior Lecturers had lost a high 33.4 per cent.

Compared to traditional comparators in the scientific, professional and managerial public sector occupations, academics had lost between 3.4 per cent and 7.6 per cent, depending on the particular comparison concerned.

Compared with salaries in the UK, Australian Senior Lecturers' salaries lost 19.1 per cent between 1973 and 1989. Compared with New Zealand, the loss was 16.9 per cent over the same period. Compared with the USA, the loss was 9.2 per cent between 1973-74 and 1988-89, but there was a relativities decline of 22.2 per cent between 1981-82 and 1988-89.

Award restructuring increases have the potential to make up some or all of the gap with traditional public sector comparators, and could eliminate part of the losses in relation to prices and to international salaries. The precise impact of the 1989 and 1990 salary increases will depend on movements in prices, comparator salaries and international salaries over the period in which award restructuring is taking place.

Whatever happens in award restructuring, there will still be a sizeable gap between the current relationship to average weekly ordinary time earnings, and that relationship in the mid-1970s. The relationship between community earnings and academic salaries is important because it affects the relative attractiveness of academia as a profession, and thus influences the magnitude of the predicted future shortage of academics.

The decline in academic salaries has not been caused by any factor intrinsic to academic work, or trends in the social utility of universities. It is acknowledged by all authorities that academic workloads were increasing at the same time as salaries were declining. As Rodney Cavalier said in the *Financial Review* recently: "It is society that has depreciated academic worth, not academic worth that has depreciated".[17]

In terms of wage fixation, the decline of academic salaries in relation to prices is explicable. It is an experience common to the whole public sector, and a function of successive policies of deficit reduction and 'small government'. The extra 3.4 to 7.6 per cent lost in relation to traditional comparators was set up when academics were **sui generis** in the Academic Salaries Tribunal, and has been a genuine anomaly in wage fixation terms.

In award restructuring, the Commonwealth Government has supported the need for a new career structure and salary increases, particularly at the points of entry to the profession. From the point of view of academic staff, it is regrettable that it has taken an imminent shortage for the Commonwealth to change its approach. It is now to be hoped that the Commonwealth stays with a more positive approach, and is prepared to fund it fully, because Government funding is the key to rectifying the historical fall in academic remuneration.

The Commonwealth pays more than $4 in every $5 spent in universities. Most of this money goes on salaries. While the Government is meant to fund whatever the industrial tribunals in their wisdom decide, in practice cause and effect is often reversed.[18] The Government of the day sets the industrial agenda, especially in relation to those areas it funds directly. **Ultimately, the Commonwealth carries the chief responsibility for the economic standing of the profession.**

It was successive Fraser and Hawke Governments that allowed enrolment increases and price increases to outstrip the increase of funding.

At the beginning of award restructuring, funding per capita was at the lowest level since the early 1960s. If Australian universities are to be able to attract and maintain a high quality staff — and in particular, if they are to be internationally competitive for staff in the years of generalised international shortage and growing private sector use of intellectual labour that are ahead — then Australia's expenditure commitment to education will have to be increased markedly.

Once in the top group of the Organisation for Economic Cooperation and Development (OECD) nations in terms of commitment to education, Australia's spending has declined in relative terms. Table 15 shows that most OECD countries from whom full figures were available were spending more than Australia in 1986.

Education is a labour-intensive human services industry. The life blood of any education system is its labour force. Unless the national capacity to pay for education is expanded Australia will slip further behind. In universities, this expansion of expenditure will need to be **more than proportionate** to the growth of current enrolments to overcome the effects of the past under-spending — and the resulting tendencies to academic shortage and quality decline that are now working their way through the system. Otherwise there will be a marked long-term decline in academic labour, to match the decline in spending on academic salaries that has already occurred.

TABLE 15
Expenditure on education, OECD countries, 1986

Country	Percentage of Gross Domestic Product spent on education
	%
Denmark	7.27
Canada	7.24
USA*	6.79
Netherlands*	6.77
Norway	6.72
France	6.62
Japan*	6.46
Ireland	6.17
Finland	5.72
AUSTRALIA	**5.65**
Switzerland	5.20
Germany	4.47
Greece*	3.08

Data from other OECD countries not available.
* indicates 1985. Includes expenditure from both public and private sources. Australia's expenditure from private sources is about half way down the group table.
Source: Organisation for Economic Cooperation and Development, *Education in OECD countries, 1986-87. A compendium of statistical information*, OECD, Paris 1989.

References and Notes

1. Between 1976 and 1988 the student:staff ratio in Australian universities rose from 11.0 to 12.8. Student load rose by 24.7 per cent but full-time equivalent academic staff numbers rose by only 7.1 per cent — *Report of the Committee to Review Higher Education Research Policy* (the Smith Committee), Canberra, April 1989, p.92. Only one quarter of 1990 research grant applications to the Australian Research Council were successful.
2. Ian Allen, Victorian Post-Secondary Education Commission, *Discussion Paper: Staffing implications of growth in higher education*, February 1989. See also Geoff Maslen, 'Campus crisis as too few dons for students', *The Age*, 29 March 1990.
3. See the various articles on academic staff shortages in Ireland, New Zealand, Hong Kong, the Netherlands, Canada, France, Germany and the United States in the 19 January 1990 edition of the *Times Higher Education Supplement*.
4. Paola Totaro, 'Professor warns of uni staff crisis', *The Sydney Morning Herald*, 13 March 1990.
5. Mr. Justice Campbell, *Report of the 1973 Review of Academic Salaries*, p.26.
6. *Ibid*, pp. 26 and 33.
7. Justice Sir Richard Eggleston, *Report of the 1964 Inquiry into Academic Salaries*, p.26.
8. Some have blamed the academic unions for the salary decline, but the decline is common to the whole public sector. For example, Steve Lewis in 'Free Market could be on the way for academic salaries', *Financial Review*, 6 February 1990: "... the greatest decline in relativities occurred during the wage explosions of 1973-74 and 1981-82, when academic unions were outperformed by most other unions". As a union without a reputation for industrial militancy, FAUSA was at a disadvantage in the salaries 'free-for-all' of those periods, but so was the CSIRO Officers' Association. As for the decline relative to the traditional comparators, the explanation lies in the combination of reduction in government funding per student, the then relative over-supply of academics in most disciplines (weakening academics' market position), the lack of direct industrial pressure, and Justice Ludeke.
9. Justice Ludeke, *Academic Salaries Tribunal, 1984 Review*, p.40.
10. Andrew White, 'Accountant wage boom on the wane', *Financial Review*, 16 March 1990.
11. Official journal of the Association of Professional Engineers, Australia. *The Professional Engineer*, Volume 43 Number 11, December 1989. See also Michael Lynch, 'Wage gap between industry, govt. engineers widening', *Financial Review*, 30 January 1990.
12. Proceedings of the Royal Australian Chemical Institute, *Chemistry in Australia*, November 1988 and November 1989.
13. Australian Bureau of Statistics, *Average Weekly Earnings*, Catalogue Number 6302.0, various years.
14. Keith Norris and Martin Cave, 'A comparison of the real salaries of university academics in Australia and the United Kingdom', *Vestes*, Volume 29 Issue 1/2, 1977, p.52.
15. New Zealand prices and average earnings statistics from the NZ Department of Statistics, via Ms Andie Fong Toy of AUTNZ. Mr Bryce Fleury of the AUTUK provided the UK data.
16. These are financial year figures because of the US data, from the American Association of University Professors, is only available in that form. This is the reason why the Australian figure for real terms decline differs from those used in the comparisons with the UK and NZ.
17. Rodney Cavalier, 'Prestige, influence of academics sliding', *Financial Review*, 27 February 1990.
18. This is not formally acknowledged in wage fixation, but it helps to set the environment and ambit of salary decisions, as industrial relations professionals are well aware. Interestingly, Mr Justice Ludeke found it necessary to formally deny that academic salary decisions were affected by such pragmatic factors when he stated in 1981:

    "13.16 It was apparent that some parties were apprehensive that the Tribunal would be influenced by the Commonwealth's funding policies for the tertiary education sector in recent years. As to the future, fears were expressed that changes in the method of funding to operate from the beginning of 1982 would cause further deterioration in the financial position of the tertiary education sector generally. Neither present nor future funding policies have played any part in my consideration. In my opinion, the Tribunal should not be deterred from recommending and determining proper levels of salary by apprehension that its decision may aggravate the financial problems of universities and colleges.

    "13.17 It should be added that although the Commonwealth took part in the debate about the possible effects of reduced funding for colleges and universities, it was punctilious in its submission. The submission was in the setting of the Government's policy of urging financial restraint, but the Commonwealth did not suggest or imply that the Tribunal was in any way handicapped in its approach to the proper assessment of academic salaries. On the contrary, the Commonwealth assured the Tribunal that it was not '. . . in the position of having to temper wage justice with employment caution'." — *Academic Salaries Tribunal: 1981 Review*, Australian Government Publishing Service, Canberra 1981, pp. 157-158.