Higher Education Quarterly, 0951–5224
Volume 54, No. 3, July 2000, pp 274–283

The UK Research Assessment Exercise: Unintended Consequences

Lewis Elton, University College London

Abstract

It is argued that many of the consequences that have followed successive Research Assessment Exercises (RAEs) have been unintended and a high proportion of these, particularly the longer term ones, are deleterious or potentially so. Of these, the most serious is almost certainly the competitive, adversarial and punitive spirit evoked by the RAE which is clearly inherent in it. Unfortunately, it is in the nature of long term consequences that, by the time that they become apparent, they are usually beyond remedying. It is therefore essential, now that there is to be a more fundamental review of the RAE, to be aware of potentially deleterious consequences, so as to avoid them before they become apparent, let alone researchable.

Introduction

It is now clear that the changes for the 2001 Research Assessment Exercise (RAE), compared to earlier exercises, will be minor (HEFCE, 1999a), while a more radical approach to change thereafter is promised (HEFCE, 1999b). However, it is not apparent that this review will necessarily include the kind of long term and often unintended consequences, identified in the present paper, which therefore constitutes an attempt at influencing HEFCE to become even more radical. Although there were exercises in the then universities in 1986 and 1989, the first quasi-universal exercise took place in 1992, and the present paper is essentially based on an analysis of lessons to be learned from the 1992 and 1996 RAEs.

Setting the Scene

For the past fifteen years, research in UK universities has been assessed for funding purposes through successive Research Assessment Exercises

(RAEs). Reports on the outcomes of the two most recent RAEs have been issued by the appropriate Funding Councils (UFC, 1992; HEFCE, 1996), there have been reports on the conduct of these RAEs (HEFCE, 1993; 1997a), an independent report of the impact of the 1992 RAE (McNay, 1997a; 1997b) was commissioned by HEFCE and commented on by it (HEFCE, 1997b), and finally there has been a consultation exercise for the next RAE (HEFCE, 1997c). A number of independent studies of the 1992 and earlier RAEs were reviewed by McNay (1997b, sec 2), and a far reaching critique of the 1996 RAE emerged from a conference (UWE/SRHE, 1997). There are undoubtedly some, arguably favourable, unexpected outcomes which have resulted from successive RAEs, such as the comparatively high quality of some of the research in the new universities, which had never been funded for research before 1992. However, this result may well be temporary, for such research was rarely of the highest quality and it may well disappear again, if research funds continue to be directed primarily towards research of the highest quality in increasingly fewer institutions. Indeed, in the longer run, it is often the unintended – and in most instances deleterious – consequences of change in a system which become important (Elton, 1988), but by the time that these emerge it is in general much too late to reverse their deleterious effects. This paper will pay particular attention to the unintended consequences of the RAEs, in the belief that such unintended consequences always occur, are in most instances deleterious and could often be avoided by forethought.

Primary Unintended Consequences of the 1992 and 1996 RAEs

The principle which has been guiding the research funding mechanism has remained unchanged throughout all the RAEs so far. It is that in a university system which has moved from an elite to a mass system, it may well be impossible to fund all its institutions for research and that therefore some selectivity is essential. In the long run, this principle may be unquestionable, but whether it applied to the United Kingdom when student participation rates had moved from 5 per cent in the 1960s towards 15 per cent in the 1980s, is much less clear. Indeed, when in 1992 the polytechnics and certain colleges of higher education joined the university sector and for the first time became eligible for research funding, the results were startling (UFC, 1992). Not a single institution failed to obtain research funds in the 1992 exercise for some of its departments, although most of the new entrants did not achieve ratings

which reflected international importance, and indeed some departments in the old universities lost research funding. This brings out the first and most blatant unintended consequence: an exercise which had been intended to concentrate research in fewer institutions had in fact led to its spread to all the institutions in a much enlarged system. Ironically, there was also an unintended positive consequence: some of the research in the new universities actually turned out to be rather good.

Not all of this new research was indigenous to the institutions, for the existence of the RAE led to a previously unknown phenomenon in UK academia – the creation of a transfer market, not unlike that well known in football, in which institutions bought active researchers with the express purpose of creating research excellences where there had been few or none before (NAPAG, 1996). It is not wholly clear how widespread this practice was – it covered probably only 1–2 per cent of active research staff – but it had a disproportionate impact on the higher education system (McNay, 1999). More recent RAE regulations are trying to prevent such transfers, but whether this particular unintended consequence was or was not desirable is, to say the least, arguable.

The Effect of Performance Indicators on Performance

There were further unintended consequences, which followed from the well known effect that all performance indicators distort performance, an effect from which Pollitt (1987) has shown higher education not to be immune. The first RAE used as its main indicator the number of refereed research publications. The result was a proliferation of new journals, and the growth of undesirable practices, such as the publication of essentially the same work in different guises in different journals and the splitting up of research papers into several smaller ones. Also, the pressure to get published disadvantaged long term research. Some, but by no means all, of these bad practices were corrected when in the second exercise, in 1996, researchers were restricted to the best four of their publications, but this in turn led to other unintended consequences. The pressure now was on for all academics to be 'research active' and to publish, since their absence from the list of 'active researchers' automatically led to financial penalties. And this in turn meant that they no longer had a free choice to see their main role either as researchers or as scholars and teachers.

Other and More Subtle Unintended Consequences

There were more subtle unintended deleterious consequences. The RAE was structured in terms of research in well established disciplines, and so research in interdisciplinary fields was even more disadvantaged than before, and it was becoming more difficult to establish new research fields (NAPAG, 1996). And since publications only counted for the RAE if they were in refereed journals, publications became more biased towards these and away from professional and more popular journals. This in turn resulted in a reduction of dissemination to potential users of research (McNay, 1997a; sec 4.5).

Some Positive Consequences – not all intended

There were positive consequences, listed by McNay (1997b). At institutional level, the organisation of research was better managed and many universities used their freedom of virement to fund lower rated departments at the expense of higher rated ones. This second consequence was hardly in line with the Funding Councils' intention to concentrate research into the higher rated departments, but followed from the obvious fact that raising a middling rating by one point was financially more profitable than reinforcing top ratings which - at least in the short run – were unlikely to drop. This financial argument is supported by some evidence that middle rated units actually give better value for money (Grichting, 1996). At the departmental level, the general improvement of RAE grades over the years may indicate that the quality of research had improved, but such comparisons over time are notoriously difficult to make. At the individual level, effects were even less clear and much of the evidence for them is anecdotal, although remarkably uniform. There was surprisingly little change of practice together with a great increase of stress. And in spite of all the competitive pressures, research collaborations continued to flourish. Academics are difficult to change.

How Reliable were the RAE Ratings?

Another worrying feature relates to the robustness of the results of the RAE. The results of the 1996 exercise led to the publication of league tables. Tomlin (1998) draws attention to three particular features of the present system which can distort the results:

- the scale of the ratings was taken to be linear for financial purposes, but it must be questioned whether the difference between ratings 4 and 5 is really the same as between 2 and 3;
- there were financial penalties for excluding certain staff, who were not research active;
- new and emerging areas were getting on average lower gradings than well established ones. Since gradings are supposed to be criterion referenced on an international scale, this latter point implies that Britain is internationally less effective in innovative research. Is there any evidence for this conclusion?

The Effect on Teaching

But above all, teaching suffered. Research pressures on creative staff reduced their ability to be creative and innovative in their teaching, an effect that first became apparent in the Enterprise in Higher Education Initiative in about 1992. This is not a research finding, but the Higher Education Advisers in the Employment Department all noted the effect. (It is typical of the difficulty of research in this area that by the time it can be done, the world has moved on.) Also, an increasing use was and is made of teaching assistants and temporary, often part-time staff, so as to relieve active researchers from teaching duties. This practice is not only in direct contradiction to the principle that research and teaching should support each other, but it is a clear indication that teaching is less valued than research. This unintended consequence, which was recognised early (Elton, 1987), stemmed in the first place from a decision by the University Grants Committee, the forerunner of the current Higher Education Funding Councils (Swinnerton-Dyer, 1985), which stated:

> It has been argued that selectivity in distributing resources should be applied to teaching as well as to research. Whatever the arguments might be, the committee does not in practice see how to do this. Research can be assessed through peer judgment and a variety of performance indicators, but there are few indicators of teaching performance that would enable a systematic external assessment of teaching quality to be made.

While in the intervening years, the assessment of teaching performance by agencies of the Funding Councils has – in contrast to the above – actually become a major industry, it is arguable whether these have indeed proved the original statement by the University Grants Committee wrong or whether they have confirmed it. What is beyond argument is that the resulting separate funding arrangements for research and teaching have had a profound effect on the work of UK universities.

The knowledge gained from evaluations of the successive RAEs have had to be fed into the next exercise within all too short time spans. The result has been that each change has produced new unintended consequences, to be changed in turn for the next exercise. But all along, teaching and research remained separately funded, and the unintended consequences of this decision are only just being taken seriously by the Funding Councils.

Longer Term Consequences

The conference on *Research Assessment: Future Perfect?* (UWE/SRHE, 1997) took a somewhat longer term and more fundamental view of the consequences of past RAEs and it was hoped – probably now in vain – that the conclusions reached would influence the next exercise in 2001. In this spirit, Fulton in his summing up called for a much more fundamental review than was apparently envisaged by the Funding Councils and warned against a consultation process which concentrated on 'fixing' the existing system in a piecemeal way. He particularly questioned whether the competitive, adversarial and punitive spirit evoked by the RAE was in the longer run truly conducive to quality enhancement. By 2001, the student participation rate will have been in excess of 30 per cent for a decade and the era of mass higher education will have established itself firmly in Britain. While this, on the basis of the American experience, will justify research selectivity, the way that it is being practised remains a live issue.

What then of the long term consequences? These can never be subjected to evaluations, which inevitably are far too short term, but they are no less real. Perhaps they will not be as serious as they might be, because of the inherent resistance to change among academics. But this in itself has serious consequences, since change is essential in a changing world. Could we finish with a system that is unchanged in what ought to be changed and changed in what ought to be unchanged? There is disquieting evidence that the RAEs have reinforced academic traditionalism in research, often in the very areas where it ought to be lessened, have discouraged new developments and interdisciplinary work, and have isolated researchers from practitioners. None of these are desirable features, but they follow from the strengths of traditional academic research, not from its weaknesses. It is this reinforcement of academic traditionalism in research that is perhaps the greatest threat which the RAE poses to research excellence in the long run.

Direct Effects of the Funding Mechanisms

Smith (1998) queried the RAE at the fundamental level of whether research funding should continue to be separate from the funding for teaching. He pointed out that at present the most successful research universities substantially subsidise in the main very traditional teaching, through their better resources and staff-student ratios, and that there was no corresponding funding for institutions to be funded directly for their innovative teaching excellence. (This omission has been recognised recently by the Funding Councils and a fund to support teaching excellence – albeit on still too small a scale – is in the process of being established.) Smith also noted that, although other countries separate research and teaching funding too, they do not do so in the punitive way that Britain does, and that the current funding dirigism – in contrast to its market rhetoric – discourages a highly desirable diversity of types of institutions, leading to a narrow competitiveness within general conformity and compliance. These are serious criticisms, and they come from the President of one of the colleges of Oxford University, surely one of the beneficiaries of the present funding system.

Press Criticisms

Other recent criticisms have come from the British Medical Association (Hinde, 1998), and there was a spate of headlines in the educational press during summer 1998, including '*RAE abuse alleged*' (3. 7. 98), '*Ratings games*' (10. 7. 98), '*RAE forces us to fudge*' (17. 7. 98), and '*Clampdown on RAE*' (24. 7. 98), in the Times Higher Education Supplement , and '*British researchers are leading the world, according to football-style performance analysis*' (16. 6. 98), '*Staff angry that universities' equal opportunity policies are being flouted in the scramble to appoint top researchers*' (7. 7. 98) and '*Research roundabout*' (4. 8. 98) in the Guardian. Even allowing for the proneness of newspaper headlines for sensationalism, these headlines indicate a worrying development in the public perception of the value of the RAE. The Association of University Teachers (Gillon, 1998) also got into the act, there were two thoughtful letters in the Times Higher Educational Supplement on 18. 12. 98, respectively on the pressure to produce papers, come what may, and on the treatment by the RAE of interdisciplinarity, and there is a postal survey (Court, 1999) on the effect of the RAE on careers, which shows a consensus that the influence of research on careers has gone too far. Whether any of the concerns expressed sensationally or thoughtfully

will have an effect on the next RAE exercise it is too early to tell, but if past experience is anything to go by, any changes will deal with criticised effects in the past without due care being taken that they do not introduce undesirable but unintended consequences in the future. It is interesting that there has been no continuation of these criticisms during 1999, presumably because it was realised that decision makers were not listening.

Practices Elsewhere

The biggest criticism, which by its very nature the RAE cannot address, is that of short termism. Perhaps the Funding Councils ought to look across the Atlantic, where recently Cherry Murray, the Head of the Physical Research Laboratory at Bell Laboratories said: 'The most important thing for me is to provide strong support for long-term research' (Feder, 1997).

Which leads finally to what is probably the greatest failing of the Funding Councils' approach to research funding. It is that – with rare exceptions such as that of Smith (1998) – little if any notice has been taken of similar developments in other countries. Research may be an international activity but the way it is funded in Britain has remained remarkably parochial. Hence, while there is much that can be learned by other countries – for good or ill – from the UK experience, the parochialism of the British is something that no other country should copy. And unintended consequences are often detected more readily from the outside.

Conclusion

This paper has drawn attention to a range of potential deleterious long term consequences, of which those identified by Fulton – regarding the competitive, adversarial and punitive spirit evoked by the RAE which are clearly inherent in it – are almost certainly the most serious. It is also the one that is potentially the easiest to remedy, since it simply requires the abolition of the RAE in its present form. This automatically leads to Fulton's positive recommendation for a much more fundamental review than is apparently envisaged. Such a review should certainly take very seriously indeed the scheme suggested by Cox and Halsey (1999), which would involve every active researcher in a particular field, in the research assessment of everyone in that field, but it should take the so far wholly neglected question of unintended long term consequences –

highly relevant also to their suggestion but not addressed by them – even more seriously.

References

Court, S. (1999), Negotiating the Research Imperative: The Views of UK Academics on their Career Opportunities, *Higher Education Quarterly*, 53, pp. 65–87.

Cox, D. and Halsey, A. H. (1999), Simple but radical, we think these changes would help, *The Guardian*, 16 July, p. 22.

Elton, L. (1987), UGC resource allocation and the assessment of teaching quality, *Higher Education Review*, 19, pp. 9–17.

Elton, L. (1988), Accountability in higher education: the danger of unintended consequences, *Higher Education*, 17, pp. 377–390.

Elton, L. (1997) Does evaluation improve universities? The British experience, *Zeitschrift für Hochschuldidaktik*, 21, pp. 80–84.

Feder, T. (1997), Bell Labs name Murray Head of Physical Research Lab, *Physics Today*, August, p. 52.

Gillon, E. (1998), Assessing the assessment system: research under scrutiny, *AUT Bulletin*, October, p. 20.

Grichting, W. L. (1996), Do our research unis give value for money?, *Campus Review of Australia*, 6 p. 29.

HEFCE et al (1993), *A report for the Universities Funding Council on the conduct of the research assessment exercise*, (Bristol, Higher Education Funding Council).

HEFCE (1996), 1996 *Research assessment exercise: the outcome*,. RAE 96 1/96. (Bristol: Higher Education Funding Council).

HEFCE (1997a), 1996 Research assessment exercise: RAE manager's report, RAE 96 1/97(Bristol: Higher Education Funding Council).

HEFCE (1997b), *The impact of the 1992 research assessment exercise on higher education in England*, M 6/97 (Bristol: Higher Education Funding Council).

HEFCE (1997c), *Research assessment: consultation*, RAE 2/97 (Bristol: Higher Education Funding Council).

HEFCE (1999a), *Research Assessment Exercise 2001: Assessment panels' criteria and working methods*, (Bristol: Higher Education Funding Council).

HEFCE (1999b), *Review of Research Policy and Funding*, Circular letter Nr 21/99 (Bristol: Higher Education Funding Council.

Hinde, J. (1998), Research funding system attacked, *Times Higher Education Supplement*, 5 June, p. 5.

McNay, I. (1997 a) *The impact of the research assessment exercise on individual and institutional behaviour in English higher education: Summary report and commentary*, Centre for Higher Education Management, Anglia Polytechnic University.

McNay, I. (1997b) *The impact of the research assessment exercise on institutional and individual behaviour in English higher education*, M 5/97(Bristol: Higher Education Funding Council).

McNay, I. (1999), 'The Paradoxes of Research Assessment and Funding', in Henkel. M and Little, B, *'Changing relations between Higher Education and the State'*, London: Jessica Kingsley.

NAPAG (1996), *Research capability of the university system*, National Academies Policy Advisory Group, (London: Royal Society).

Pollitt, C. (1987), The politics of performance assessment: lessons for higher education, *Studies in Higher Education* 12, pp. 87–98.

Smith, D. (1998), Gold standard guarantees mediocrity, *Times Higher Education Supplement*, 15 May, p. 12.

Swinnerton-Dyer, P. (1985), Circular letter 22/85 (London: University Grants Committee).

Tomlin, R. (1998), Research league tables: is there a better way? *Higher Education Quarterly* 52, pp. 204 - 220.
UFC (1992), *Research assessment exercise 1992: the outcome*, 26/92 (London: Universities Funding Council).
UWE/SRHE (1997) *Research assessment: future perfect?*, (Bristol: University of the West of England and the Society for Research into Higher Education).