THE FOUNDATION FOR SCIENCE AND TECHNOLOGY

LECTURE AND DINNER DISCUSSION SUMMARY SHEET

# Routes of excellence in higher education

Held in the rooms of the Royal Society on 14 December 1999
Sponsored by Glaxo Wellcome Plc

*In the Chair:*
The Rt Hon the Lord Jenkin of Roding

*Speakers:*
Professor John Sizer CBE, Chief Executive, SHEFC
Dr Alan Rudge CBE FREng FRS, Chairman EPSRC 1994-1999
The Lord Oxburgh KBE FRS, Rector, Imperial College of Science, Technology & Medicine

Dr Rudge's lecture raised the question whether the dual support system was the best way to channel Government funds for university research. One alternative would be for the Research Councils to pay the full costs of the projects they supported rather than leaving overheads to be covered by the Higher Education Funding Councils.

In discussion a number of speakers urged the need for research to be supported from a range of sources, on the ground that no committee could be trusted to make the right decisions all the time. Against this it was argued that requiring the universities to go through a separate process in order to cover their overheads did not represent real diversity of funding. Nevertheless, a recent investigation of engineering research was said to have found that industrial research centres were generally funded both by the parent corporation and from contracts, under arrangements analogous to the dual support system. It was suggested also that institutions with modest research ratings would not do as well under a single support system.

A number of speakers drew attention to the different remits of the funding bodies, the Funding Councils being there to promote the well-being of higher education while the Research Councils focussed on achieving results within their subject areas. This point was not, however, accepted without challenge: the Engineering and Physical Science Research Council, for one, accepted a responsibility for the health of the science base.

The lectures acknowledged a number of criticisms of the research assessment process. In discussion further points were noted.

The RAE was seen as encouraging an unhealthy degree of

convergence. Every institution felt bound to enter the system, and the very strong positive feedback, in the engineering sense of the term, tended to concentrate research in a handful of universities. The RAE did not measure outputs against inputs, and as a result it was easy for departments which had been highly rated in past assessments to continue to score high. With the funding they enjoyed they should be expected to do good research. A department with little track record in research had to fight much harder to climb up the league table.

It was seen as unfortunate that RAE ratings, theoretically intended to be applied simply as factors in funding formulae, were prominently quoted by high-scoring departments and used to attract staff, students and grants. This was made worse by the adoption of a scale with fixed steps, a feature which was not necessary for the purposes of the funding system. It would be difficult, however, not to make quality markings public, given the desirability of transparency over the calculation of allocations.

One speaker considered that industry would never use any system as cumbersome as the RAE. The administrative burden of the RAE was blamed for diverting university staff from teaching. The drop-out rate among undergraduates gave cause for serious concern, and one explanation offered was that university teachers had to spend a third of their time on paper-work. On this it was observed that there was a linear relationship between A-level grades and undergraduate drop-out rates, which were therefore perhaps a consequence of the highly desirable widening of the higher education base. Less well-prepared students would nevertheless benefit if academic staff were less burdened by administration and had more time for teaching.

The RAE was criticised for failing to take account of applied research, of the extent to which research was exploited, or of the human dimension - the quality of management of research students and contract researchers. It would help, one speaker suggested, if the Research Councils agreed to feed their knowledge of university research departments into the RAE process.

The system was said to encourage growth in the volume of research at the expense of investment in infrastructure. Special funding programmes to bring facilities up to scratch were welcomed by some speakers but criticised by others because of the high cost of unsuccessful applications. There was a general view that proper support for infrastructure must be built into the system, and the universities were said to be concerned that the Funding Councils did not take this issue seriously enough.

In spite of the criticisms levelled at the RAE there was support for improving it rather than starting afresh. The assessment process was seen as providing essential accountability and a

means of using scarce resources selectively. It was suggested also that many of the shortcomings of the current arrangements, and the greatly increased burden on universities compared to the first RAE, were the results of changes pressed on the Funding Councils by Vice-Chancellors individually and collectively.

Some speakers sought clarification of aspects of the working of the RAE. One question was how it assessed long-term, non-economic research and multi-national research. The answer in both cases was by reference to publication in peer-reviewed journals. The use of such publications as the touchstone meant that UK research was assessed, in effect, against research done overseas, since most peer-reviewed journals were international. By the same token, the RAE could not take account of unpublished defence research.

A researcher in a well-funded department whose work helped it earn a 5* rating could see no tangible benefits from the RAE apart from prestige. The answer offered was that the Funding Council allocations which the ratings helped to secure went to pay a large part of the salaries of the staff in such departments so that they could be freed do research instead of teaching.

The discussion was primarily concerned with the funding of research, but several speakers emphasised the importance of teaching in universities. It was what distinguished them from research institutes. A view from one of the new universities was that they should develop their involvement in some aspects of research, partly for the benefit of their undergraduate teaching. It had been stimulating for them to enter the RAE. They faced a difficulty, however, if they had non-traditional departments which did not fit the RAE categories.

It was not yet clear how the setting up of the devolved administrations in Scotland and Wales would affect the assessment of university research. Currently the same process operated throughout Great Britain, although there were some differences in the way the results were translated into grants. Thus in Scotland the Funding Council had chosen to fund a road research base, one of the objects being to support teaching as a remedy for social exclusion. If the different countries adopted very different regimes in the future it was suggested that research teams might migrate. In Scotland, however, there was said to be a strong wish to remain within a UK research assessment system. Political guidance was awaited.

*Jeff Gill*

*The discussions were held under the rule that nobody contributing to them may be quoted by name after the event. None of the opinions stated are those of the Foundation for Science and Technology, since, by its constitution, the Foundation is unable to have an opinion.*