UK research economies

## British weather to cost more?

THE Meteorological Office is the latest British government agency to come under the scrutiny of civil servants briefed to find ways of increasing efficiency. But it appears to have survived the ordeal better than some, and the implications for research staff are less than catastrophic, although its customers seem likely to have to pay more in future for services provided. The Met. Office's response is not expected for some months.

The Resource Control Review of the Meteorological Office, produced by the Management Services Division of the Ministry of Defence, has some complimentary things to say about the Met. Office's international scientific standing, which it is keen not to damage. The Met. Office plays an important part in the World Meteorological Organization and has recently been designated one of the two World Area Forecasting Centres (the other is in Washington, DC). As well as providing weather forecasts for military and civil users, the Met. Office spends about £8 million a year on research in meteorology and geophysics, with a high proportion geared to customer needs.

The review does, however, conclude that there is not enough external scrutiny of research activities, and urges reconstitution of the Meteorological Research Committee, composed of Met. Office staff and independent experts, which was abolished a year ago as an economy measure. Indeed, the review says, the committee should have increased powers to advise on research projects and to establish collaborative links with universities, research councils and other external organizations. The review also suggests restoring the research fellowships for visiting academics which fell by the wayside when manpower counting rules were altered so that fellowships were included within staff ceilings.

One of the review's most significant recommendations is that the director general should have greater delegated financial powers from the Ministry of Defence, with lower levels of management taking more responsibility for planning. Bureaucratic limitations are felt by some to have hampered the Met. Office in the past. Less popular will be the suggestion that the training college, Shinfield Park, might be replaced or at least part of the grounds sold off. Staff levels have fallen by 13 per cent in the past four years and the college is now under-used.

Most of the potential savings identified concern the provision, and, particularly, the charging policy for forecasting services. It is recognized that the state meteorological service should continue to provide some free forecasts, to the press and to the British Broadcasting Corporation, but the review says that the ultimate objective for

all other services should be to recover full costs. At present the philosophy behind the Met. Office's charging policy is to maximize revenue, and it is feared that dramatic price increases for specialized services, such as those provided to farmers and builders, might deter users for whom forecasts are not absolutely essential.

One specific recommendation the review makes is that it should no longer be possible for members of the public to have free telephone access to a forecaster. It also calls for a review of the level of forecasting provided for Royal Air Force stations in Britain and suggets that savings could be made by grouping stations together for this purpose. The Royal Air Force, it can safely be assumed, will resist any such attempts.

Sir John Mason, director general at the Met. Office, says that many of the recommendations will have to wait until a formula for cost accounting to the different services is agreed. At present, costing is done on the basis of staff costs but with increasing automation this formula has introduced distortions. The review ducks this problem, suggesting that it be tackled by another committee.

Tim Beardsley

## BA evolves

THIS year's annual meeting of the British Association for the Advancement of Science, to be held next week at the University of Sussex, marks something of a departure from the format of previous years. Sir John Mason, the association's president, hopes that the changes will attract more practising research scientists to the meeting and aims to turn it into a "parliament and festival of British science and technology".

The major innovation is a series of specialist seminars, which are expected to attract several hundred research scientists. The seminars, called "Mason conferences", have been organized by various learned societies, which have been given a free rein in arranging topics. This year most of these conferences are in the physical sciences but if the idea proves a success the list will be extended next year to include biological and social sciences.

Biologists will not be short-changed, however — biotechnology is the subject of a day-long general symposium. Many of the talks in other subjects will be linked to the four themes for this year's meeting — disasters, science in Europe, science policy studies, and land use and resource exploitation. Children are catered for by a special programme of activities and there are also events for young people. The organizers expect, on the basis of advance bookings, that the meeting will be crowded.

Tim Beardsley

Soviet industry

## The old old problem

A NEW "experimental" scheme of financial incentives announced last month marks a renewed assault on the besetting problem of Soviet industry - how to implement research results rapidly at shopfloor level. During the past 15 years, successive five-year plans have called upon scientists to provide the production sector with technological innovation, and have urged the establishment of new structures such as regional science centres to encourage closer cooperation between research institute and shop-floor or collective farm. These efforts, however, have been in many cases vitiated by factory managers, who, under the present system of calculating wages and bonuses, see the new technology as a threat to their income.

Soviet planning, with its rigid system of quarterly, yearly and five-yearly targets, makes no provision for temporary shutdowns for modernization. While it is relatively easy, therefore, to put new technology into a new plant, the renovation or modernization of an existing plant imposes considerable financial penalties on the work force. Not only is there a temporary loss of bonuses, due to failure to achieve targets that in many cases were set before the need for modernization became apparent, but, in the case of energy and resource-saving technologies, the wagefund may even be permanently reduced.

Although there are some financial incentives for innovation and resource saving (including an elaborate system of medals and orders), hitherto the wary manager would make his own private cost-benefit study before deciding whether to support or frustrate efforts to install the new technologies proposed by well-meaning scientists. Sometimes, it appears, plant managers have even entered into contracts with research institutes to undertake some project, as urged by the directives on "scientific and technical progress", with no real intention of ever acting on the results.

The new procedures, which at present are confined to factories under the ministries of heavy industry and the electro-technical industry, together with selected light-industry plants in the Byelorussian, Ukrainian and Latvian republics, represent the first real effort to come to grips with this problem. Accordingly, in addition to changes in the system of indices used for calculating wages and bonuses (so as to act in favour of innovation), managers will be given a considerable degree of independence in the allocation of funds earmarked for research and development. These can now be used not merely for research, design and pilot studies, but also to cushion the short-term disadvantages of introducing new technology.

Vera Rich