

OLD WORLD

ASTRONOMY

New Face at the RGO

SPECULATION about the next Director of the Royal Greenwich Observatory has been stilled by the announcement that Professor Margaret Burbidge has accepted the post. Reaction among staff members of the observatory is one of pleasure that an astronomer of such distinction will be directing the RGO in the near future.

Asked what it felt like to be the first woman director of the RGO, Professor Burbidge said on Monday "I find the prospect very interesting especially since there is a great move to do something about the position of women in science." But she also pointed out that there is a better tradition of accepting women in astronomy than in other physical sciences.

Before moving to the United States in 1951, Professor Burbidge was Assistant and Acting Director of the University of London Observatory. She is perhaps best known for her work on quasars, largely carried out in collaboration with her husband, Professor Geoffrey Burbidge. Much of the apparent tardiness of the Science Research Council in announcing the appointment may, indeed, be attributed to the difficulty of offering such a post to one half of such an eminent astronomical couple. Both Geoffrey and Margaret Burbidge have spent the past few summers in Cambridge (since the inception of the Institute of Theoretical Astronomy) and the new director says that her husband will probably divide his time between California and Cambridge after she takes up the post next summer. No formal decision on this can be made, however, until the future of astronomy in Cambridge is itself decided. The present uncertainty about the Institute and Cambridge Observatories will be resolved in discussions starting at Cambridge on Tuesday, October 12.

The future of the Royal Greenwich Observatory is also undecided. One vital question is whether the observatory will have direct control over the proposed British observatory to be established in the Mediterranean area (see *Nature*, 232, 289; 1971). Because the new director is unable to take up her appointment immediately, it seems that it will be some months before decisions will be made known about this new observatory. But whatever developments there are in the observational plans for Greenwich, it seems certain that the close links forged recently with the group of theoretical astronomers at the University of Sussex

will be maintained. Professor Roger Tayler, Director of the Astronomy Centre at Sussex, said this week that he hopes the present collaboration with the RGO will continue and expand in the future.

ATOMIC ENERGY

Swan Song?

THE annual report of the United Kingdom Atomic Energy Authority, published on Wednesday this week, shows an increased proportion of work done in collaboration with industry and government departments but carried out with a smaller staff (House of Commons Paper 552, HMSO, £0.85.)

On April 1, 1971, the day after the period covered by the report, the Production Group of UKAEA was transferred to British Nuclear Fuels Limited, the Radiochemical Centre at Amersham was converted into The Radiochemical Centre Limited and a newly-formed National Radiological Protection Board took over responsibilities previously held by the authority in the field of radiation hazards and their effect on health and twenty-nine members of its staff. Since then it has been announced that the Weapons Group, including the Atomic Weapons Research Establishment at Aldermaston, will be transferred to the care of the Ministry of Defence, probably by the summer of 1972 (see *Nature*, 232, 434; 1971). This leaves the authority with the Reactor and Research Groups and 19,802 employees as at April 1, 1971, compared with 29,427 on March 31, 1971. This number will be reduced by a further 6,000 when the transfer of the Weapons Group is effected and the principal continuing function of the authority, according to the report, will then be "the further development of nuclear energy for the generation of electricity . . . and the continuation of the underlying work necessary to support this activity".

The research and development budget for the past year shows a decrease from £59.4 million in 1969-70 to £58.5 million. Money spent on the reactor programme decreased from £43.3 million to £41.9 million with a change of emphasis in the support for the gas cooled reactors—the Mark III reactor support being increased by £1.9 million to a total of £5.2 million with a corresponding decrease in the support for the Mark II system.

Support for other research remained substantially unchanged at £12 million compared with £12.8 million the previous year, nearly all the decrease originating from decreased support for back up nuclear projects. Expenditure on non-nuclear research, however,

increased by £0.6 million to £3.6 million. The authority's net expenditure during 1970-71 was £37.1 million compared with an estimated £42 million this year. The gross expenditure of the authority during 1970-71 was £95.3 million, offset by £57.2 million in receipts—£20.5 million in defence settlement payments, £9 million in sales and £8.6 million in agency services and receipts under research agreements. Sales this year are estimated to bring in £6.9 million.

Success in the sale of nuclear fuel abroad is also reported, with three contracts for supplying uranium hexafluoride to the United States won during the year as well as two contracts for supplying the material to Sweden and Switzerland. Other overseas contracts were won in Canada, Germany and Japan. The upward trend in enriched uranium production in recent years is now bound to level off following delays and changes in the programme for commissioning nuclear power stations in Britain.

Support for the plasma research laboratory at Culham amounted to £4.1 million last year. Maybe it is in this laboratory that increased effort should be concentrated in future years to harness the power of nuclear fusion. It is reported that results along these lines are encouraging and that "continuing attention was given to the technical problems of envisaged generating systems using fusion reactors". It is possible that the revenue lost to the authority by the formation of the new companies will eventually be replaced by income arising from the commercial development of the work currently in progress at Culham.

RESEARCH COUNCILS

Rallying of the Clans

HARD on the heels of the Science Research Council's comments on the Dainton report (see *Nature*, 233, 298; 1971) come those of the Natural Environment Research Council in its own annual report published last week (HMSO, £0.85). The council says it learned "with relief" that the Council for Scientific Policy had decided to conduct an inquiry under Sir Frederick Dainton into the organization of civil science as "the continual reviews and proposals for reorganization of science, of the kind that the council (NERC) has been subjected to for most of its existence, are necessarily disturbing". The council warns, however, that concepts and plans for the advance of scientific knowledge must not be "unduly dictated by the immediate practical problems". Like the Science Research Council, NERC believes in the "basic good sense of the Research Council system" and that "the principles