

CORRESPONDENCE

Elitism in Astronomy

SIR,—I have followed the various discussions about British astronomy, and have been surprised that the chief factor we would consider in the US has remained unmentioned in public.

I refer of course to a critical number of first rate scientists. Between the two Royal Observatories and Pretoria, as an outside observer I count six first rank astronomers. In Pasadena associated with the Hale Observatories, I count fourteen astronomers of distinctly higher average performance. The UK group is split between three locations and three establishments. In quantity of first rank people at one location, all three are operating at a sub-critical level.

It has been suggested that to set up a national centre with a critical number of high calibre astronomers is elitism. The question is not whether the UK wants an elite. It is whether it wants one place alive, or many half dead. Such a centre would not be a third centre. It would be a first centre. Its physical location should in the absence of special constraints be preferably chosen on logistical grounds. But the good reasons for avoiding existing institutions are that the petty inter-institutional squabbles and prior staff commitments of existing institutions might create a sickening home for a healthy baby organization.

Yours faithfully,

NEVILLE J. WOOLF

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Conquest of Cancer

SIR,—I would like to clarify some aspects of the Conquest of Cancer Bill, S.1828, recently passed by the Senate and now awaiting House action. As the director of a cancer hospital and research institute, I am vitally interested in the conquest of cancer, and as a member of the National Panel of Consultants appointed by the US Senate, I participated in the recommendations that led to S.1828.

Unfortunately, there is considerable confusion about the provisions of S.1828. This confusion, understandably, comes about because S.1828 evolved from several other bills and proposals with identical or similar names.

S.1828 provides for increased emphasis on cancer research within the framework of the National Institutes of Health. The National Cancer Institute will remain a part of NIH, but will have

greater autonomy. It will not become a separate agency. Nor will its relationship to NIH be a "name only" affair as has been mistakenly stated by those who confuse it with other proposals. Under S.1828, the National Cancer Institute remains in its own buildings on the NIH campus. The NCI personnel will continue to interact with the other institutes within the NIH. The NCI will continue to use the Clinical Center of NIH for studies on patients. It will continue to use the NIH computer facilities and the NIH laboratory animal breeding and holding facilities just as it does today. The NCI will continue to use the NIH study sections for peer review of research grant applications, but will be able to supplement them with additional study sections concerned with specific aspects of cancer. For example, I hope to see a breast cancer study section added. The major change in the relationship of the Cancer Institute involves greater budgetary and planning freedom. Instead of the present arrangement that requires six (6) layers of officials above the Cancer Institute to study and approve all major plans and budgets, the Director of the Cancer Institute will report directly to the President. This administrative change will speed up the conquest of cancer considerably.

In every other respect the Cancer Institute will retain its present connexions with the other institutes and with NIH.

Furthermore, to be certain of good coordination with the NIH and other government agencies, S.1828 provides that the Advisory Council of the Cancer Institute must include, as ex-officio members, the director of NIH, the Secretary of Health, Education and Welfare, and the director of the Office of Science and Technology.

Some charge that S.1828 will break up the National Institutes of Health. But NIH is not so fragile that a change to increase efficiency and give greater autonomy to an operating institute will destroy it. Businesses and other government agencies are frequently reorganized for greater efficiency.

Another criticism is that other Institutes within NIH will want similar arrangements for themselves. Perhaps they will. Let's try it with one: the Cancer Institute. If cancer research moves ahead more rapidly under the new arrangement (as most of us who studied the situation believe it will), and if other institutes then wish to have a similar arrangement, why not give it to them? After all, we are primarily concerned with improving the people's health, not with maintaining

any specific administrative pattern. If, on the other hand, cancer research does not progress more rapidly under the new arrangement, the other institutes would not want to copy it.

Some fear that the increased emphasis on cancer research implies a promise of a cure for cancer in a few years. No one associated with S.1828, the National Panel of Consultants, or the American Cancer Society has ever made or implied such a promise. We do believe that the time has come for an accelerated and intensified assault on cancer, and that the eventual conquest of this disease can be brought nearer.

Would passage of S.1828 result in neglect of basic research? Exactly the opposite is true! S.1828, and the Report of the Panel of Consultants both call for expanded basic research.

Finally, there is the point that the bill cannot guarantee a cure for cancer. There is no doubt about that and, indeed, no one would suggest there is a guarantee of a cure for cancer in any kind of legislation. There is the assurance in this bill that progress will be faster and that the cures will come sooner than they would without it. That is reason enough for its enactment and that is the reason my colleagues and I support it.

Yours faithfully,

SOLOMON GARB

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Research and Development

SIR,—Your review of Dr Duncan Reekie's survey for the Centre for the Study of Industrial Innovation of abandoned industrial R and D projects complains that it is "rich in detail and poor on analysis and generalization". We would be the first to admit that the survey is short on the kind of loose ill-defined and often unsupportable generalization from which the discussion of innovation greatly suffers. Your reviewer provides a number of new illustrations—for example, that "even successful research and development projects in Britain are understaffed". One major object of the centre is to study in detail what happens in firms so that general conclusions can rest on an adequate basis of knowledge. It is perhaps because firms realized the relevance of this approach (rather than because of "luck" as your review suggests) that they cooperated so fully in Dr Reekie's study.

Your reviewer writes as though the report suggests that projects should not be abandoned. On the contrary, it refers to the inevitability of this. But your review is altogether too complacent to claim that none of the cases Dr Reekie reported should cause surprise and that all of them merely represent "unavoidable ups and downs of commercial life". In no fewer than seven of the twenty firms visited development projects had been abandoned because they had been unwittingly duplicated within the same organization. In other cases, there had been several years of successful technical development before any market assessment had been undertaken. Surely no management could claim that such cases were unavoidable? In regard to the timing of abandonment your reviewer appears to agree with the centre—though with an odd twist he suggests that he is saying something different.

We appreciate your having paid so much attention to our first report. But we must advise those of your readers who wish to know what the report says to read it in the original.

Yours faithfully,

DUNCAN BURN

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of Industrial Innovation,
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Those who collect information but who neglect to analyse it must surely not be surprised if others draw lessons from it which may sometimes be unwelcome—Editor, *Nature*.

Erratum

Last week's News and Views editorial "Haemoglobin Synthesized in *Xenopus* Eggs" (233, 161; 1971), contained the

erroneous statement that AUGpolyU is translated when injected into *Xenopus* eggs. Of course, as Gurdon *et al.* reported in their article on page 177 of that issue, this messenger does not promote the incorporation of phenylalanine.

British Diary

Tuesday, September 28

Centralized Control Systems (four-day conference) Institution of Electrical Engineers; and the Institution of Electronic and Radio Engineers, at Savoy Place, London WC2.

Schizophrenia: Biochemistry, Genetics and Therapy (two-day conference) Schizophrenia Association, at Church House, Dean's Yard, Westminster, London SW1.

Wednesday, September 29

Less Common Methods of Separation (9.30 a.m. symposium) Institution of Chemical Engineers, Midlands Branch, at the University of Birmingham.

Microbial Control in Pharmaceutical and Cosmetic Preparations (two-day symposium) Society of Cosmetic Chemists of Great Britain, jointly with the Pharmaceutical Society of Great Britain, at Imperial College, London SW7.

Thursday, September 30

Biochemical Engineering (2 p.m. symposium) Institution of Chemical Engineers, at the University of Technology, Claverton Down, Bath.

Friday, October 1

Autumn Meeting and Annual General Meeting (afternoon) Bone and Tooth Society, at the Royal Dental Hospital, London.

The Properties of Anticorrosive Pigments (10 a.m.) Mr J. Bowden, Oil and Colour Chemists' Association, Scottish-Student Group, at the St Enoch Hotel, Glasgow.

Saturday, October 2

Teaching of Mathematics in Schools in Relation to the Teaching of Physics (symposium) Institute of Mathematics and its Applications, jointly with the Institute of Physics, at Eton College, Windsor.

Monday, October 4

Practical Pigment Dispersion (7 p.m.) Mr J. R. Groom and Mr M. Baker, Oil and Colour Chemists' Association, at the Queens Hotel, George Street, Hull.

Reports and Publications

not included in the Monthly Books Supplement

Great Britain and Ireland

An Index to the Systematic Collection of Minerals in the British Museum (Natural History). Twentieth edition. Pp. 39. (London: British Museum (Natural History), 1971.) 20p. [96]

University of Bristol, Department of Agriculture and Horticulture. Long Ashton Research Station—The National Fruit and Cider Institute. Report for 1970. Pp. xv+208. (Long Ashton, Bristol: Long Ashton Research Station, University of Bristol, 1971.) £1.25. [96]

Plant Breeding Institute, Cambridge. Annual Report 1970. Pp. x+126. (Cambridge: Plant Breeding Institute, 1971.) 75p. [106]

Agricultural Research Council. Meat Research Institute—Annual Report 1969-70. Pp. 80. (Langford, Bristol: Meat Research Institute, 1971. Obtainable from HMSO.) 89p net. [106]

Myth, Magic and Archaeology. By Professor F. J. Tritsch. (Inaugural Lectures delivered on 8 December 1970.) Pp. 20. (Birmingham: The University, 1971.) 15p. [106]

Building Research Station Digest, No. 130: Drainage Pipelines—1. Pp. 8. (London: HMSO, 1971.) 5p. [116]

University of Strathclyde. Annual Report 1969/1970-Part 1: Pp. 1-130. Part 2: Pp. 131-193. (Glasgow: University of Strathclyde, 1971.) [116]

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