

the National Tuberculosis Survey, the Perinatal Mortality Survey, the Dental Caries Survey and the Thalidomide-induced Congenital Deformities Survey were substantial pieces of work in this category. On many occasions special committees have been set up to sift evidence and tender advice to the Minister on problems which he had asked the Council to consider. Some indication of the increasing activity of the Council lies in the fact that, in the twenty-five years of its existence, the Council has given a total of 990 grants to research workers and that this has led to the publication of 456 papers in scientific journals.

C.S.I.R.O. and Engineering in Industry

THE Commonwealth Scientific and Industrial Research Organization (C.S.I.R.O.) sponsors research relating to primary and secondary industry in Australia. The progress of engineering depends fundamentally on discovering new scientific knowledge and the development of methods and machines for using this knowledge. A recently published booklet describes and illustrates some of this research as now being prosecuted in the C.S.I.R.O. laboratories which, with appropriate field-stations, function in all States in Australia (*C.S.I.R.O. and Engineering in Industry*. Pp. 48. Melbourne: C.S.I.R.O., 1964). The centres discussed are the National Standards Laboratory, consisting of the Divisions of Physics and Applied Physics, located at Chippendale, New South Wales; the Division of Tribophysics, University of Melbourne, Victoria; the Division of Mechanical Engineering, Highett, Victoria; and the Physical Metallurgy Section, University of Melbourne, Victoria. "In addition to the work of these laboratories, investigations concerned with the engineering aspects of particular industries are included in the work of several other C.S.I.R.O. units undertaking research related to these industries." While this publication does not concern itself with engineering problems under investigation in the fields of chemical processing, mineral utilization, fuel technology, food processing, building, and wool textile manufacture, all within the ambit of C.S.I.R.O. activities, it does cover a number of subjects of vital importance in the engineering industry. Those mentioned include production engineering; metal surfaces; metals and other solids; measurements and standards; length standards and measurements; mass volume and density; force pressure and hardness; dynamic measurements; electrical measurements; light and optics; temperature and humidity measurement; air conditioning, and solar energy. There is a great deal of information on the trend and manner of original research being undertaken under each of these headings, and the text is rendered all the more interesting and understandable by the excellent series of photographic illustrations and coloured diagrams included in this booklet. "In the production of food, clothing, buildings and appliances, in transport and communications, and even entertainment and cultural activities, engineering has made possible tremendous advances in the satisfaction of human needs." If this publication is any guide to the somewhat limited scope of problems in the engineering industry therein described, then the wider research programme embraced by C.S.I.R.O. must be most impressive and well worth a future booklet on the same lines giving us an extended picture of its achievements.

The Rowett Research Institute

A REPORT on "Animal Nutrition and Allied Sciences" might well be expected to cover a very wide range of topics. The annual report of the Rowett Research Institute, 1964, does indeed fulfil this expectation (20, 1964. Pp. 88. Bucksburn, Aberdeen, Scotland: Rowett Research Institute, 1964. 10s.). A deep and sustained study of animal nutrition encounters a whole host of problems over the complete range of biological science,

and so it is not surprising that the work described in this report has aspects of interest to biologists, physiologists, microbiologists and pathologists, as well as to those directly concerned with the practical problems of animal nutrition. In 1963, the Rowett Research Institute celebrated the fiftieth anniversary of its foundation. In the volume entitled *Progress in Nutrition and Allied Sciences* published to celebrate the occasion, we have been given an informative account of the activities of the Institute over half a century. In the present report we learn something of current research and the progress achieved in the various sections of the Institute ranging from basic studies on enzymology and on the nitrogenous constituents of grass leaves to direct nutritional experiments on ruminants, pigs and poultry. This information is conveyed in the form of summaries of published papers, together with supplementary notes about papers in preparation or in the press and on work in progress. A full bibliography is included so that the original papers referred to may be readily located. As in recent years, two reviews are included on topics which have been specially studied in the Institute. The first, by Dr. J. Davidson, is entitled "The Utilization of Dietary Energy and Protein by Poultry", while the second, by Dr. E. I. McDougall, is on "Proteinuria and Protein Structure". These reports are typical of the activities of the Institute. The first deals with a problem of considerable practical importance for the producer of eggs and poultry, and the approach is critical and scientific. The second is concerned with the nature and origin of the proteins found in the urine of sheep and cattle and also of man. It is therefore of general biochemical and physiological interest rather than concerned with nutrition in the narrower sense of the word.

Biochemical Journal

THE issue for January 1965 (94, No. 1) of the *Biochemical Journal* is the first to be published by the Biochemical Society itself. Hitherto the *Journal* has been published by the Cambridge University Press, although it was conducted by the Society. The *Journal* is now distributed by the Chemical Society. The two Societies continue to be responsible for their own publishing and editorial policies. With the change in publishing arrangements the cover of the *Journal* has been given a 'new look'. The first 16 pages of this issue represent the new edition of "Suggestions and Instructions to Authors", which can also be obtained in a separate cover (price 2s. 6d., or 0.40 dollar, post free) from the Secretary to the Editorial Board, *Biochemical Journal*, 20 Park Crescent, London, W.1.

Index of Agricultural Research, 1964

THE Agricultural Research Council has now issued a fourth edition of its *Index of Agricultural Research* (Pp. ix+1056. London: Agricultural Research Council, 1965. Obtainable from H.M.S.O. 12s. 6d.). This replaces the third edition published in 1957. It gives details of the work of the Council's agricultural research institutes and units and research in the institutes grant-aided by the Council, or by the Department of Agriculture and Fisheries for Scotland on the advice of the Council. The *Index* is arranged in three parts: Part 1 shows the work in progress at the agricultural research institutes and units, together with the names of the research workers concerned; Part 2 is a subject index which provides an easy guide to research in progress on any particular subject; Part 3 is an alphabetical list of research workers. Particulars are also given of projects undertaken in universities, colleges and other organizations with financial support from the Council. The *Index*, together with its companion volume, *The Agricultural Research Service*, provides information about all scientific research for which the Agricultural Research Council has responsibility.