

will be explored. While deploring the circumstances which have made these undertakings possible, archaeologists welcome the expenditure of funds in this direction, which, it is hoped, will at least make a beginning in putting the archaeological exploration of the south-eastern States on the same systematic basis as the exploration of the south-west.

Coventry Libraries

THE Coventry Libraries and Museum Committee's report on the work of the year 1932-33 gives evidence of vigorous growth of the services under its care. The Committee fosters the closest possible contact between the libraries and all activities of a cultural character, and is providing additional accommodation for such activities adjacent to its central library, where already during the past year meetings of societies devoted to the study of art, history, natural history, the drama, engineering, bee-keeping, etc., numbered 271, including 120 meetings of groups for the discussion of broadcast talks. Among the most popular of the subjects of these discussions was "Biology and Everyday Life". Provision of books for children through the school library system, serving 55 schools and supplementing the activities of the special junior departments of the libraries, accounts for one sixth of the total issues. Through the West Midlands Regional Library Bureau, the resources of many libraries in other parts of the country were drawn upon by way of temporary loans to meet special requisitions. By the circulation of publicity material among branch libraries, the maintenance of a variety of book displays throughout the system was ensured. Some of the most popular displays related to cooking, wireless, gardening, polar exploration, holiday literature, modern drama and home decoration. Among other services successfully maintained are: the *Coventry Bookshelf*, a monthly medium of communication with readers; an "Illustrations Collection" of 15,000 pieces; a "lucigraph" for making facsimile copies of maps, prints, drawings, etc.; a commercial and technical intelligence service, equipped with up-to-date indexes to practically all technical material published throughout the world, patent abridgments, consular and diplomatic reports, etc.; and frequent exhibitions of material relating to matters of special local or regional importance.

Reform of Medical Education

IN his Bradshaw lecture recently delivered before the Royal College of Physicians, Dr. C. S. Myers discusses the education of the medical student from the point of view of the industrial psychologist. As regards pre-medical study, which consists of physics, chemistry and biology, he considers that far more time is spent in practical work on such subjects than is necessary for those who are not going to specialise in any of them, especially as they have no educational value for the future doctor. A similar criticism is directed against the enormous amount of detail in anatomy and physiology required of the student, whereas little attempt is made at this stage to gather anatomical information from the corpse in the post-mortem room. The student derives his knowledge of

human anatomy mainly from dissection of the cadaver, in which the desiccated organs have lost their form and their relations in the living body. As a remedy for these and other defects in medical education, Dr. Myers makes the following suggestions. In the first place, the student should spend part of his time in the wards as soon as he begins to study anatomy and physiology. Secondly, during the hospital period, he should receive a more complete education in the whole range of medicine and surgery before he attends the specialist departments. Thirdly, some training in the recognition and treatment of psychoneuroses is necessary for the future general practitioner, who is too liable to mistake the true nature of such conditions. Lastly, before entering into general practice, he should serve an apprenticeship between the passing of the qualifying examination and the actual conferment of the diploma or degree.

Australian Meteorological Data

THE Council for Scientific and Industrial Research of the Commonwealth of Australia has published valuable meteorological statistics under the title "Meteorological Data for Certain Australian Localities" (Pamphlet No. 42, Melbourne, 1933). A foreword explains that, for some time past, various investigators on the Council's staff had made extensive use of unpublished data collected by the Commonwealth Meteorological Bureau, in connexion with researches in soil science, entomology, plant industry, animal health, etc., and it was thought worth while to make such information more accessible to investigators by publishing selected data. The matter was discussed with the Meteorological Bureau, and it was agreed that the Bureau should provide the data and arrange the material in a form suitable for publication, while the Council would bear the costs of publication. This pamphlet is the result of the co-operation of those two bodies. It gives in tabular form, for several hundred stations in Australia and Tasmania, mean monthly and annual values of daily maximum and minimum temperature and relative humidity, and average monthly and annual totals of rainfall. These averages refer to periods of varying length, as a rule not less than 15 years, and in not a few cases between 70 and 80 years. In the rare cases where the period is only five or six years, the figures may—especially in the case of such a variable quantity as rainfall—depart considerably from those that would be found over a suitably long period, but this drawback is nearly always met with in meteorological statistics for sparsely populated countries, and recourse must be had to such short records if large areas are not to be left unrepresented. A large folding map is attached at the end of the publication, which gives the meteorological divisions adopted by the Bureau and shows many of the stations included in the tables.

Eugenics in Vera Cruz

IN December 1932 a new eugenic law was enacted in the State of Vera Cruz, which has the largest population in Mexico. A Bureau of Eugenics and Mental Hygiene was organised as a part of the

Health Department of the State. This Department has been engaged in eliminating smallpox and yellow fever, and has also greatly reduced the frequency of hook-worm, its sanitary services being in co-operation with the Mexican Government and the Rockefeller Foundation. The new Bureau is thus included in a public service and has large powers. Free birth control clinics were instituted, and sterilisation provided for in serious cases of unfitness and inadaptability. This is the culmination of a series of reforms made by Governor Tejada, which included the suppression of saloons, compulsory sex education in the schools, mandatory medical treatment for venereal disease and a new civil code which entailed eugenical provisions in matters of marriage and divorce. By the new regulations, which are given in full (*Amer. J. Psychiatry*, 13, No. 2) by Dr. S. Mendoza, who drafted the bill, provisions are made through the Bureau of Eugenics and Mental Hygiene not only for the dissemination of information but also for the control of sterilisation of persons suffering from hereditary diseases or from conditions which the Bureau considers to be "a cause of biological degeneration or mental deficiency in their offspring".

Association of American Geographers

THE thirtieth annual meeting of the Association of American Geographers was held on December 26-28, at North-western University, Evanston, Illinois. In the three day session fifty-seven papers were presented, including thirteen in the field of geomorphology, ten or more in regional geography and six in urban geography. The remainder represented a diversity of subjects. The afternoon of December 26 was devoted to the general subject of "Conventionalizing Geographic Investigation and Presentation". The papers on this subject were presented by Profs. P. E. James of the University of Michigan, Wellington D. Jones of the University of Chicago and V. C. Finch of the University of Wisconsin. A feature of the meeting was an address by Dr. L. Dudley Stamp, an invited guest of the Association, who spoke on "One Hundred Years of Change in Land Utilisation in the British Isles—the Work of the Land Utilisation Survey of Britain". The retiring president, François E. Matthes of the United States Geological Survey, gave the annual address. He spoke on "Our Greatest Mountain Range, the Sierra Nevada of California". The following officers were elected for 1934: *President*, Dr. W. W. Atwood, president of Clark University; *Vice-President*, Prof. V. C. Finch, chairman of the Department of Geography, University of Wisconsin; *Secretary*, Prof. F. E. Williams, University of Pennsylvania; *Treasurer*, Prof. R. S. Platt, University of Chicago.

Greenkeeping Research

THE autumn volume (No. 9) of the *Journal of the Board of Greenkeeping Research* contains a useful summary of experimental and practical results on the use of sulphate of ammonia and sulphate of iron as fertilisers and weed killers for lawns. It is interesting to note that the treatment has stood the test of

several years' practical application, but its effects cannot be ascribed directly to increase in the acidity of the soil. Dr. F. T. Bennett describes a disease of turf known as *Fusarium* patch. The Director of the Board's Research Station at St. Ives, Bingley, Yorks, Mr. R. B. Dawson, contributes the fourth of a series of articles on "Common Weeds of Turf", whilst other members of the staff write on "A Greenkeeper's Guide to the Grasses" (Mr. I. G. Lewis) and "Composts and Fertilisers in Relation to Greenkeeping" (Dr. T. W. Evans). A new form of steriliser for killing weed seeds in compost which is to be applied to weed-free turf is described by Mr. K. M. A. Enthoven, of Hilversum, Holland. The subject matter of the whole volume is of great interest—almost a necessity—to golf green keepers, but the more general horticulturist will find a great deal of definite teaching which will help him to make his lawns the beautiful stretches of green sward which he so earnestly desires.

Scientific Horticulture

THE "Horticultural Education Association Year Book", vol. 2, 1933 has just appeared under the able editorship of Mr. R. T. Pearl (Wye, Kent. H. E. A., South-Eastern Agricultural College, 3s. 6d.). "Commercial Horticulture in Lincolnshire" is described by Messrs. J. G. Murray, F. Wakerley and J. C. Wallace, whilst Mr. D. V. Howells writes on the same topic for Scotland. Various aspects of fruit-growing are dealt with by Messrs. N. B. Bagenal, W. G. Kent, F. Kidd and C. West, B. S. Furneaux, R. Hart and A. J. Wooldridge. Dr. R. N. Salaman contributes a paper on potato virus diseases, Mr. C. A. Cameron Brown reviews early progress in electric soil heating, Dr. R. M. Woodman writes on weed killers, Mr. R. K. MacDowall on spraying with sulphuric acid, Mr. W. E. H. Hodson on chrysanthemum eelworm, and Mr. F. A. Secrett on "Early Market Garden Produce". Direct problems of teaching are discussed by Messrs. W. H. Christian and R. T. Pearl, whilst the presidential address by Mr. N. B. Bagenal is a biography of Thomas Andrew Knight. A valuable series of book reviews is added. The whole volume is a pleasing blend of science with practice.

Fossilised Tree Remains in Yellowstone National Park

SCIENCE SERVICE, Washington, D.C., has recorded an interesting discovery made during the construction of a new road from Tower Falls to Mammoth Hot Springs in Yellowstone National Park. While cutting through a rock, two petrified tree-stumps, both upright as they stood, the report says, millions of years ago, were brought to light. The progress of the new road has left the specimens cut in halves, embedded in the solid rock, which was probably volcanic dust when petrification was taking place during the Miocene period. It is even possible to trace the complicated root systems of the specimens. It has not been decided what species the remains represent. Chestnut, sycamores, sequoias, pines and cypress have all grown in this region during the centuries in which the fossilisation took place.