

of a weed with certain soil conditions, its possession of poisonous or other special properties, as well as the best methods for its eradication, are given in each case.

Salad Crops

THE growing of salad crops has become a highly specialised business in several parts of England and there seems no reason why the acreage devoted to this branch of horticulture should not be profitably extended. As an aid to growers, whether on a large or small scale, the Ministry of Agriculture has issued an illustrated bulletin (No. 55, H.M. Stationery Office, 1s. 6d. net), from which it is evident that with good management it is possible to have supplies for the market throughout the whole year. Lettuce is quite the most important crop that is included under the term salad, and the best methods for its cultivation in the field, in heated and unheated glass-houses or in frames, are described in detail. Some account is given of the varying methods adopted in different districts and the varieties found to be most satisfactory in each locality, while cultural methods in use in other countries such as America and France are also included. Watercress is another important crop grown for salad purposes. Although little difficulty is experienced in its cultivation, it is essential that the water in which it is grown should be of the highest quality as the industry has suffered considerable harm from cress grown in contaminated streams. Attention to local conditions and markets, and the choice of a suitable variety to meet these requirements, are also needed if the cress-growing is to prove a thoroughly profitable undertaking.

Forest Flora of Syria

AN expedition under the leadership of Dr. Alexander Eig, head of the Section of Systematic Botany and Ecology at the Hebrew University, Jerusalem, has been examining the forest and other flora of Syria (Science Service, Washington, D.C.). During the tour, the members of the expedition were able to collect valuable material for the herbarium as well as to complete plans for the Syrian Section of the new Botanical Garden at Mount Scopus. The party travelled twice throughout the length and three times across the width of Syria, and were able to fix in a preliminary fashion the line of demarcation between the Mediterranean zone and that of the Urano-Turanic region, the precise boundary between which was previously unknown. An important part of the expedition's work was a study of the forest species of Syria, and the investigations undertaken enabled the principal types of forest species, particularly in the Amanus and Cossus hill regions, to be determined. A study thus begun came to the knowledge of the French Governor of Jebel Druze. The expedition received great assistance from the French Government officials in the mandated territory north of the Sykes-Picot line, and the French Governor has asked Dr. Alexander Eig to advise on the subject of afforesting certain parts of the Jebel Druze region. The determination of the principal Syrian forest types will be, it is said, of considerable importance to the Botanical Garden on Mount Scopus.

Revision of Ordnance Plans

THE methods adopted in the field revision of the large-scale Ordnance Survey Plans, with some account of earlier methods, are described and explained in detail in a pamphlet by Capt. J. C. T. Willis ("An Outline of the History and Revision of the 25-inch Ordnance Survey Plans". H.M. Stationery Office. 2s. 6d.). The revision in the field is carried out by methods of prolongation and intersection but new detail must be 'hung' on to the original survey and not on to matter added at a previous revision. The use of specially selected points on the original survey has been abandoned and the equal reliability of all the original detail is accepted. The newest development adopted to counteract the liability of errors in redrawing the revised sheet entails the use of 'coated' paper at that stage. This paper permits all old detail to be expunged chemically, without affecting the surface of the paper beneath. Then it is found possible to avoid the redrawing of old detail, which involves a saving in accuracy as well as in time. A method of partial revision has had to be adopted in the centres of town and cities on the ground of economy. This neglects minor alterations in back premises while concentrating on the alignment and position of street fronts. The pamphlet contains a number of practical examples of revision, illustrated by charts, and discusses the kind of errors the surveyor may make.

Weather Maps showing Typical Distributions of Pressure

A PAMPHLET has been produced (Air Ministry: Meteorological Office. Examples of Weather Maps showing Typical Distributions of Pressure. (M.O. 237, second edition.) Pp. 8. (London: H.M. Stationery Office, 1932.) 3d. net.) to meet the needs of those schools where another publication prepared by the authority of the Meteorological Committee entitled "The Weather Map", which forms an introduction to modern meteorology, is used as a textbook for the teaching of elementary meteorology. The latter work appeared a little more than two years ago (see NATURE, 126. 755, Nov. 15; 1930). Being a comparatively expensive production (price 3s. net, compared with 3d. net in the case of the pamphlet under notice), it was regarded as unsuitable for distribution to individual pupils and accordingly six of the most important illustrative synoptic weather charts have here been selected from it so that pupils would be able with the pamphlet in front of them to follow the explanations of a teacher using "The Weather Map" as a textbook. The six figures selected are those numbered 9, 18, 21, 22, 23 and 24 in the textbook, and give typical examples of a depression, anticyclone, secondary depression, V-shaped depression, wedge and col. There is no explanatory matter beyond a paragraph describing the weather corresponding with the various letters that appear on the map (the Beaufort weather notation is used), the method of showing the speed and direction of the wind, the temperature, and—by means of isobars for 4 millibar steps—the distribution of pressure. The two publications, both

of which are to be obtained from H.M. Stationery Office, should, if used generally at schools, put young students on very familiar terms with the weather maps appearing in many of the leading newspapers, and at the same time give some idea of the methods of working of the official forecasters.

Atlantic Ice

THE work of the United States ice patrol on the Atlantic shipping routes during 1931 (International Ice Observation and Ice Patrol Service, 1931. Coast Guard Bulletin, No. 21) records a most unusual year. The normal number of icebergs coming south of lat. 48° N. during the year is 419; this is the mean of thirty-two year's records. During 1931 only 13 icebergs came so far south and ten of these were in May, which is the month of widest spread ice distribution on the Grand Banks. March showed two bergs and April one south of the 48th parallel. There is only one record of another year so free from ice—in 1924 only eleven bergs were recorded. These figures may be contrasted with more than a thousand in 1929, 1912, and 1909. The report contains the usual chart of the distribution of ice on the routes frequented by shipping and also the records of oceanographical observations. An interesting appendix gives an account of the ice observations made in the polar seas during the cruise of the *Graf Zeppelin* in July 1931 over the Barents and Kara Seas.

The North-East Passage

RUSSIAN newspapers have announced that an expedition on the ice-breaker *Sibirjakov*, under the leadership of Prof. Schmidt, has succeeded in navigating the whole length of the North-East Passage, from the White Sea to Vladivostok. The most dangerous section was found near the North Land, which the expedition rounded on the northern side, where it was necessary to blow up the ice in order to make any progress. The mouth of the Lena was reached in less than a month after leaving Archangelsk, but great difficulties were encountered between the mouth of Kolyma and the Bering Strait. Here the ice was three to four metres thick and all the blades of the ship's screw were broken one after another. After six days of strenuous work the ship's stern was raised above water by shifting the coal and the necessary repairs made, but when the expedition was only ninety kilometres from the Bering Strait, the screw was lost altogether, since the main axle broke, so that the remainder of the journey had to be made under sail.

Memorial to Dr. R. Stenhouse Williams

THE National Institute for Research in Dairying, University of Reading, has recently issued an appeal for funds to provide an appropriate memorial to the late Dr. R. Stenhouse Williams, first director of the Institute, who died on February 2, 1932. It has been decided to devote the fund chiefly to the further development of the Institute, to which Dr. Williams devoted all his energies. The signatories to the appeal, who represent dairy science in all its aspects,

consider that this application of the fund will form a lasting monument to Dr. Stenhouse Williams. A small permanent memorial will also be erected within the Institute. Further information can be obtained from Mr. S. R. Whitley, "Rookwood", Shinfield, Reading.

M. Santos Dumont

ON December 21, the State funeral of Santos Dumont, the Brazilian pioneer of aviation, took place in Rio Janeiro. His death occurred on July 23 at São Paulo, and owing to the disturbed state of the country he was first interred there. On December 18, after the body had lain in state in the crypt of the Cathedral of São Paulo for some time, it was removed to the capital, where on arrival it was met by an escort of military and naval aircraft which performed evolutions during the transit from the station to the Cathedral of Rio Janeiro. The public were afterwards admitted to pay their last respects to one who is proclaimed by his country as the father of aviation, and on December 21 the final rites took place at the St. John the Baptist cemetery.

Announcements

MR. H. T. TIZARD, Rector of the Imperial College of Science and Technology, has been appointed chairman of the Aeronautical Research Committee in succession to Sir Richard Glazebrook.

THE Government of Ecuador has awarded the decoration of Al Merito, in the degree of Gran Oficial, to Dr. George Sheppard, State geologist to the Republic of Ecuador, in recognition of his valuable work in a consulting capacity to various departments of the Government, and also in appreciation of his published contributions to geological science during the past few years.

THE annual report of the Rockefeller Foundation for 1931 details the activities of the Foundation, of its grants in aid in various domains of human knowledge, scientific and humanistic, with brief reviews of the chief researches carried out under its endowment. Much work has been done on yellow fever, including trials of preventive vaccination. Under malaria, the existence of two races of *Anopheles maculipennis*, the chief mosquito-carrier in southern Europe, is described, one with barred, the other with dappled eggs, the former predominating in the non-malarious districts. The disbursements of the Foundation during the year amounted to 17,477,225 dollars.

APPLICATIONS are invited for the following appointments, on or before the dates mentioned:—A public analyst for the Metropolitan Borough of Fulham—The Town Clerk, Town Hall, Fulham, S.W.6 (Jan. 4). A principal of the Newport Technical College and Institute—The Director of Education, Education Offices, Charles Street, Newport, Mon. (Jan. 14). A University professor of civil engineering at the Imperial College (City and Guilds College)—The Academic Registrar, University of London, S.W.7 (Feb. 17).