largely concerned with the prevention of malaria, and in Northern Rhodesia they had been able to reduce the mortality from this disease among the European workers in the copper mines from 22 to 9, and among the natives from 31 to 5, per 1,000.

Meteorological Service for Indian Air Routes

"METEOROLOGICAL ORGANISATION FOR AIRMEN, 1937", is the title of a pamphlet compiled under the direction of Dr. C. W. B. Normand, Director-General of Observatories, India Meteorological Department, for the benefit of airmen flying anywhere between the Persian Gulf and Burma (Delhi: Manager of Publications. 2*s*. 3*d*.). It describes the organization maintained by the India Meteorological Department on behalf of aviation, the nature of the information about current weather that is obtainable from that organization, and all that an airman requires to obtain that part of the information which he may require on any flight. Full information in regard to the latter must include the addresses and telephone numbers of officers responsible under the Director-General for particular parts of the whole area dealt with, their office hours, and the times at which they complete synoptic weather charts, if the airman is to make the most of the information available. It may be noted, however, that on the trans-India air route between Karachi and Victoria Point, Burma, the issue of different kinds of meteorological message by wireless to all the main aerodromes has been organized on a routine basis and the latest information can be obtained from weather notice boards at such aerodromes; alternatively, it can be obtained by the airman by wireless while he is in flight. All these points are systematically treated in a series of tables that occupy most of the pamphlet, and among these tables are the very important ones that explain the different codes which make it possible to condense much information about actual and expected weather into telegrams or wireless messages. There is a key map showing the positions of the various types of meteorological station, and the boundaries of the different forecast areas and provinces. The organization embraces the whole of Baluchistan and Burma as well as India.

Royal Scottish Society of Arts

THE Royal Scottish Society of Arts is, like its prototype the Royal Society of Arts, one of the few unspecialized learned societies. It draws together men engaged in the pursuit of applied science and art of the most diverse kinds. In a prospectus just issued, this peculiarity is emphasized, and it will doubtless be accounted to the Society for righteousness by those who set a high value on general culture. The principal objects of the founders were "to stimulate and reward genius and mechanical industry and to afford a ready and useful medium of intercourse among men of all ranks who were engaged either in the pursuit of Science or in the various practical departments of the Arts and Manufactures". During the winter session there are fortnightly meetings at which papers are read, and a course of special lectures on a subject of general interest is given by a selected specialist. Prizes are offered for inventions and communications. The Council desires to suggest, especially to prospective student members (for whom the annual subscription is only 5*s*. up to the age of twenty-three years) that attendance at the ordinary meetings and participation in discussions provides an extremely easy and really valuable means of extending their general and technical education. Evidently a complete survey of adult education would not ignore the opportunities offered by this Society.

Modern Sylviculture

IN an article entitled "Revue de Sylviculture", published originally in the *Revue generale des Sciences pures et appliquees* (48, No. 7, April), Prof. H. Perrin deals with the practice of modern sylviculture more especially from the French point of view. He points out that in former times the forest was regarded solely as a source of supply of timber and smaller materials, on the supposition that such supplies would continue inexhaustible. Latterly, he says, there has been a swing-back, in some quarters, to this point of view. He pleads for a return to, or a continuance of faith in, the sylvicultural principles laid down by the old masters of the science or art, of whom the last century provided some of the best known. Perrin deals with the various aspects of, and factors influencing, sylvicultural practice, and details in a general manner French methods. A close acquaintance with the forest is not easy to acquire, owing to the fact that the methods of investigation common to all the biological sciences are difficult of application in the forest; long years of observation must be passed during which generations of men succeed each other; and only continuity and persistence will result in that sylvicultural knowledge and practice which is the antithesis of the 'get rich quick' theory as applied to forest management, which has made its appearance of late years in places.

The R.H.S. Lily Year-Book

CONTRIBUTIONS from the point of view of the practical gardener predominate in the Royal Horticultural Society's Lily Year-Book for 1937 (from the Society's Office, Vincent Square, Westminster, S.W.1, 5*s*. paper; 6*s*. cloth; pp. 153. Oct. 1937). Information upon the choice of lilies for all situations in the garden can be found in it, and the increasing popularity of *Nomocharis* and fritillary is reflected by several articles on these genera. Dr. W. B. Turrill contributes a useful taxonomic study on fritillaries, giving detailed descriptions of anatomy. A report of discussions upon the propagation of lilies from scales provides much practical information. Two papers, by Dr. Fred Stoker and F. C. Stern, compare lilies which will grow on lime-free and lime soil respectively. No sharp distinction can be drawn between the lily flora of these two horticultural habitats, and the absence of more scientific experiments leaves a doubt as to whether lime or some other influence is really the controlling factor. Mr. L.

Ogilvie describes experiments upon the depth of planting, and the effects of high and low temperatures, on lily bulbs. One cannot escape the conclusion, however, on considering the contents of the present volume, that it deals with less fundamental questions than previous issues.

Leeds College of Technology

ON the occasion of the distribution of prizes and certificates by Sir William Bragg on December 7, the principal of the Leeds College of Technology presented a report on the work of the last session, emphasizing the value to the local industries of the thoroughly up-to-date technical instruction given in the College to more than three thousand of their personnel. The total number of students was 3,862, of whom 3,320 attended evening classes only and 375 attended part-time day and evening classes. Although education authorities are often inclined to disparage evening classes on the ground that after a hard day's work people cannot be expected to be fit for serious study, they are nevertheless a very valuable part of the country's educational resources. As the principal points out, they are, moreover, capable of exerting a definitely beneficial effect on character: "To attend evening classes regularly after the day's work, for several sessions, each of which includes an English winter, is an indication of grit and perseverance in addition to intellectual ability". It is noteworthy that 379 students were released by employers to attend part-time day classes, generally in addition to evening classes.

Vocational Guidance

A 'VOCATIONAL GUIDANCE' pamphlet has been issued by the University College of the South-West of England, Exeter, for the use of parents and others. It gives a list of the various college courses with particulars of their duration and the fees payable for them, a list of vocations (other than teaching) for which the courses offer suitable preparation, and a list of other vocations. The attention of parents is directed to the fact that in some cases the course of study is of one year's duration only and entails no long or expensive training. Accompanying the pamphlet is a leaflet directing attention to the increased demand for scientific investigators both for routine and research duties, to the importance for entry into commerce or industry of good qualifications in modern languages and economics, and to a new course for a diploma in public administration. This diploma will, it is anticipated, be a valuable qualification for higher posts in the national and local government services.

The Laxminarayan Technical Institute, Nagpur

THE foundation stone of the Laxminarayan Technological Institute was laid by His Excellency Sir Hyde Clarendon Gowan, Chancellor of the Nagpur University, at Nagpur on December 8, 1937. The Chancellor paid great tribute to the untiring efforts of the present Vice-Chancellor, Sir Hari Singh Gour, in acquiring the present site for the Institute, which will be surrounded by charming scenery. The construction of the Laxminarayan Technological Institute and its workshop is the result of a princely bequest, now amounting to more than £400,000, made by the late Rao Bahadur D. Laxminarayan in 1930 to the University of Nagpur for the teaching of applied science and chemistry. The University has decided to begin with the creation of a department of applied chemistry for teaching and research work in this subject. Dr. R. S. Thakur, who had been deputed for the last two years by the University of Nagpur to visit England and the continent of Europe for practical training in applied chemistry, with special reference to oil technology, has now been appointed as the organizing officer. It is expected that the Institute will be in active operation about July of next year.

Refrigeration Conference

A REFRIGERATION Conference will be held in London on July 12, in the rooms of the Royal Society. This Conference, which is convened by the British Association of Refrigeration, will take place immediately following a meeting at the same centre of the Technical Commissions of the International Institute of Refrigeration, an organization with headquarters in Paris. The subjects provisionally set down for discussion at the Conference, which will be open to all technicians interested in refrigeration, are: influence of low temperatures on enzymes, vitamins, etc.; limitations of 'gas storage'; air conditioning problems; an international unit of refrigeration; standard tables giving the properties of refrigerants. Further information can be obtained from the Hon. Secretary, British Association of Refrigeration, Empire House, St. Martin's-le-Grand, London, E.C.1.

Mathematical Colloquium at St. Andrews.

A MATHEMATICAL colloquium, similar to the very successful gatherings held in 1926, 1930 and 1934, will be held in St. Andrews on July 4–July 15, 1938, under the auspices of the Edinburgh Mathematical Society. Short courses of lectures will be given by prominent mathematicians, including Prof. E. T. Whittaker, Prof. G. D. Birkhoff, Dr. A. C. Aitken, on topics of pure and applied mathematics. On their way to the colloquium, members will have the opportunity of attending a meeting of the Royal Society of Edinburgh, celebrating the three hundredth anniversary of the birth of James Gregory, who held in succession the chairs of mathematics in the Universities of St. Andrews and Edinburgh. This meeting will be held in Edinburgh on July 4. Further particulars of membership of the colloquium can be obtained from the Hon. Secretary, Edinburgh Mathematical Society, 16 Chambers Street, Edinburgh 1.

The Night Sky in February

FULL moon occurs on February 14 at $17{\cdot}2^h$ and new moon on March 2 at $5{\cdot}7^h$ U.T. No occultation of stars brighter than magnitude $5\frac{1}{2}$ occurs this month.