

IN an address delivered before the British Medical Association at the meeting in Montreal last week, Dr. T. G. Roddick, the President of the Association, gave a description of the condition of medical education in Canada. He showed that laboratory methods prevail in the medical schools of the Dominion, all with the idea of developing the scientific spirit in students, and of cultivating methods of thought with observation. Referring to the value of a preliminary science course, he said that the late Prof. Huxley thought it was a most self-evident proposition that the educational training for persons who proposed to enter the medical profession should be largely scientific; not merely or even principally because an acquaintance with the elements of physical and biological science is absolutely essential to the comprehension of human physiology and pathology, but still more because of the value of the discipline afforded by practical work in these departments in the process of observation and experiment, in inductive reasoning, and in manipulation.

EDUCATION in science is not obtained by reading, but by personal observation and experience. It is possible, however, to create and stimulate an interest in natural knowledge by means of books wisely selected and used. This is what the National Home Reading Union aims at doing. The work of the Union is mainly concerned with literature and human history, but it also includes natural history. During the session 1897-98, shortly to commence, a course of reading in elementary botany will be taken. The session is not a favourable time for the study of flowering plants, but flowerless plants can be studied as well in the winter as in the summer. Among the latter plants especial weight will be given in the course to those forms of fungi and algæ which have been recently shown to play so large a rôle in the preparation of soil, in the ripening of cheese, and in other industrial processes, as well as in the causation of disease in plants and animals. The course will thus not only draw attention to interesting forms of plant life, but will also be of assistance in understanding the nature of bacteria. We presume that the students who take up the course are recommended to obtain a small microscope, and are instructed how to use it in the observation of the organisms described.

SOCIETIES AND ACADEMIES.

PARIS.

Academy of Sciences, August 30.—M. A. Chatin in the chair.—On the hypocycloid of Steiner, by M. Paul Serret.—On plasmolysis, by M. Mouton.—Photography of fluoroscopic images, by M. Charles Porcher.—*Pseudocommis vitis* (Debray), a parasite of marine plants, by M. E. Roze.

NEW SOUTH WALES.

Linnean Society, July 28.—Prof. J. T. Wilson, President, in the chair.—On the occurrence of the genus *Palæchinus* in the Upper Silurian rocks of New South Wales, by John Mitchell. The author described and figured a fragmentary specimen comprising the middle portion of an interambulacral area showing four rows of plates, from the Middle Trilobite Bed, Bowring Village, N.S.W.—Two ornate boomerangs from North Queensland, by R. Etheridge, junr.—New Australian lepidoptera, by Oswald B. Lower. Eighteen species, chiefly referable to the *Ecophoridae* and *Gelechiidae*, are described as new.—On the *Cinnamomum*s of New South Wales: with a special research on the oil of *C. Oliveri*; Bailey, by R. T. Baker. The genus *Cinnamomum*, hitherto unrecorded for New South Wales, is now shown to occur over a large area of the coastal district, being represented by two species, *C. Oliveri*, Bailey, and *C. virens*, sp. nov. The former species has in the past been mistaken in the northern colony for *Beilschmiedia obtusifolia*, and has only recently been identified as a *Cinnamomum*; very probably the same confusion of species has occurred in New South Wales. *C. virens* appears to stand somewhat alone, its affinities with known species not being very marked. Descriptions of the timber, gall-fungus, bark and oil are given. The oil obtained from *C. Oliveri* is highly aromatic, and is found to contain cinnamic aldehyde, eugenol, together with other constituents. The bark gave nearly 1 per cent. of oil. It is hoped that a new commercial product may result from these investigations.—On the Rhopalocera of Lord Howe Island, by G. A. Waterhouse.

The late Mr. A. S. Olliff enumerated ten species as occurring on the island ["Lord Howe Island," &c. *Memoirs of Australian Museum*. No. ii. p. 98, 1889]. The number is now increased to eighteen species, of which eight were not previously recorded. All the species are known to occur on the Australian continent.—Stray notes on Papuan ethnology, part ii., by C. Hedley. Two articles from New Guinea are described: (a) A gigantic fish hook, 19 inches long, usually miscalled a shark hook, brought from Milne Bay by Mr. N. Hardy. Recent researches in the Ellice Islands indicate that this is employed to catch a deep-sea fish there called "Palu"; possibly an unknown species of the *Macruridae*. The present hook differs from any hitherto known by a mounting of wicker work for the attachment of the fishing line. (b) An intricate knot used by the women of East New Guinea in making the grass petticoat; and attention is drawn to the value of such a detail in tracing the migration or descent of races.

BOOKS, PAMPHLETS, and SERIALS RECEIVED.

BOOKS.—The New Psychology: Dr. E. W. Scripture (Scott)—Leghe Metalliche ed Amalgame: I. Ghersi (Milano, Hoepli).—La Fabricazioni dell' Acido Solforico: Dr. V. Vender (Milano, Hoepli).—Manuale del Chimico e dell' Industriale: Prof. L. Gabba (Milano, Hoepli).—Philosophy of Knowledge: Prof. G. T. Ladd (Longmans).—Laboratory Practice for Beginners in Botany: Prof. W. A. Setchell (Macmillan).—Natural Elementary Geography: J. W. Redway (New York, American Book Company).—Chart of the World: Dr. H. Berghaus, xii. edition (Gotha, Perthes).

PAMPHLETS.—A Critical Period in the Development of the Horse: Prof. J. C. Ewart (Black).—Archeological Studies among the Ancient Cities of Mexico: W. H. Holmes, Part 2 (Chicago).—Observations on Popocatepetl and Ixtaccuahuatl: Dr. O. C. Farrington (Chicago).—List of Mammals from Somaliland: D. G. Elliot (Chicago).—Bæveren i Norge deus Udbredelse og Levemaade: R. Collett (Bergen, Griegs Bogtrykkeri).

SERIALS.—Contemporary Review, September (Isbister).—National Review, September (Arnold).—Scribner's Magazine, September (Low).—The Atoll of Funafuti, Part 3 (Sydney).—Fresenius' Quantitative Analysis, translated by C. E. Groves, Vol. 2, Part 5 (Churchill).—The Atlantic Monthly, September (Gay).—The Fortnightly Review, September (Chapman).—Observatory, September (Taylor).—Geographical Journal, September (Stanford).—Journal of the Chemical Society, September (Gurney).—Imperial University, College of Agriculture, Bulletin Vol. iii. Nos. 2 and 3 (Komaba).—Astrophysical Journal, August (Chicago).

CONTENTS.

PAGE

Abelian and Theta Functions. By G. B. M.	441
The Culture of Fruit	442
Our Book Shelf:—	
Courtney: "Masonry Dams from Inception to Completion"	443
Sergi: "Biblioteca di Scienze Moderne"	443
Meadowcroft: "The A.B.C. of the X-Rays"	444
Letters to the Editor:—	
The Corona Spectrum.—J. Evershed	444
The late Earthquake in India. (<i>Illustrated</i>).—Rev. J. D. La Touche	444
The Centipede-Whale.—Kumagusu Minakata	445
The Approaching Total Eclipse of the Sun. VI. (<i>Illustrated</i>). By Sir Norman Lockyer, K.C.B., F.R.S.	445
Victor Meyer	449
Notes	450
Our Astronomical Column:—	
Dedication of the Yerkes Observatory	454
Southern Double Stars	454
Variable Stars in Clusters	454
The Magnitudes of the Asteroids	454
A New Nebula Photograph	454
A Successful Experiment in Lobster-Rearing	455
The British Association:—	
Section K.—Botany.—Opening Address by Prof. H. Marshall Ward, F.R.S., President of the Section	455
Physics at the British Association	461
Chemistry at the British Association	462
University and Educational Intelligence	463
Societies and Academies	464
Books, Pamphlets, and Serials Received	464