

usual morphology and reproduction.—C. **Maltézos**: Contribution to the phenomena of lightning.

September 9.—M. P. **Appell** in the chair.—A. **Müntz**: The evaporation of the soil and of plants as a factor in causing the persistence of wet and cold weather.—Daniel **Berthelot** and Henry **Gaudechon**: The action of the ultra-violet rays upon gaseous hydrocarbons. Remarks on a recent note by Marc Landau.—Em. **Bourquelot** and M. **Bridel**: A new synthesis of the glucoside of an alcohol with the aid of emulsin. β -Benzylglucoside.—Ch. **Jolin**: The specific histological characters of the "luminous cells" of *Pyrosoma giganteum* and of *Cyclosalpa pinnata*.

NEW SOUTH WALES.

Linnean Society, July 31.—Mr. W. W. **Froggatt**, president, in the chair.—Rev. W. W. **Watts**: The ferns of Lord Howe Island. During a two months' stay, last year, Mr. Watts collected specimens of the unique fern-flora of the island. The paper indicated the species to be found on the northern hills, in the central area, and at the southern end of the island, where Mts. Lidgbird and Gower rise to a height of 2500 and 2800 ft. respectively. The plateau on the top of Mt. Gower is the home of a number of beautiful species to be found nowhere else.—R. J. **Tillyard**: Some new and rare Australian Agrionidæ (Neuroptera: Odonata). In this paper, a considerable number of new Australian species are described, and new genera are proposed for the reception of these and other species.—H. J. **Carter**: Descriptions of some new species of Coleoptera.

BOOKS RECEIVED.

Manuale di Fisica ad uso delle scuole secondarie e superiori. By Prof. B. **Dessau**. Volume Primo. Meccanica. Pp. xii+500. (Milano: Società Editrice Libraria.) 12 lire.

Mysore Geological Department. Report of the Chief Inspector of Mines for the Year 1910-11. With Statistics for the Calendar Year 1910. (Bangalore: The Government Press.) 2 rupees.

Practical Chemistry, including Simple Volumetric Analysis and Toxicology. By Prof. P. A. E. **Richards**. Second Edition. Pp. x+149. (London: Baillière, Tindall and Cox.) 3s. net.

Handwörterbuch der Naturwissenschaften. Edited by E. **Korschelt** and others. Lief. 14-18. (Jena: G. Fischer.)

Index of Economic Material in Documents of the U.S. Ohio, 1787-1904. Parts i. and ii. By A. R. **Hasse**. Pp. 1136. (Washington: Carnegie Institution.)

Department of Commerce and Labour. Coast and Geodetic Survey. Results of Observations made at the Coast and Geodetic Survey Magnetic Observatory at Vieques, Porto Rico, 1909 and 1910. By D. L. **Hazard**. Pp. 94+10 diagrams. (Washington: Government Printing Office.)

Modern Sanitary Engineering. By G. **Thomson**. Part i., House Drainage. Pp. xv+266. (London: Constable and Co., Ltd.) 6s. net.

The World's Cane Sugar Industry, Past and Present. By H. C. P. **Geerligs**. Pp. xvi+399+plates+maps. (Altrincham: N. Rodger.) 12s. net.

The Origin and Evolution of Primitive Man. By Dr. A. **Churchward**. Pp. 88+46 plates. (London: G. Allen and Co., Ltd.) 5s. net.

Science French Course. By C. W. P. **Moffatt**. Pp. x+305. (London: W. B. Clive.) 3s. 6d.

Home University Library:—The Human Body. By Prof. A. **Keith**. Pp. 256. The Making of the Earth. By Prof. J. W. **Gregory**. Pp. 256. Electricity. By

Prof. G. **Kapp**. Pp. 256. (London: Williams and Norgate) Each 1s. net.

Bacon's New Globe, with Contour Colouring. (London: G. W. Bacon and Co., Ltd.) 25s. net.

British Plant-galls. By E. W. **Swanton**. Pp. xv+287+32 plates. (London: Methuen and Co., Ltd.) 7s. 6d. net.

Spiderland. By P. A. **Ellis**. Pp. xxii+108. (London: Cassell and Co., Ltd.) 3s. 6d. net.

Malta and the Mediterranean Race. By R. N. **Bradley**. Pp. 336. (London: T. F. Unwin.) 8s. 6d. net.

New South Wales. Historical, Physiographical, and Economic. By A. W. **Jose**, T. G. **Taylor**, and Dr. W. G. **Woolnough**. Edited by Prof. T. W. E. **David**. Pp. xii+372. (Melbourne: Whitcombe and Tombs, Ltd.) 4s. 6d.

Dizionario di Merceologia e di chimica applicata. By Prof. V. **Villavecchia**, Dr. G. **Fabris**, Dr. G. **Rossi**, and Dr. A. **Bianchi**. Terza Edizione. Vol. ii. Pp. 1360. (Milano: Hoepli.) 15 lire.

Bartholomew's New Reduced Survey Maps for Tourists and Cyclists. Sheet 9, Berwick and Haddington. Sheet 21, Inverness and Spey. (Edinburgh: J. Bartholomew and Co.) Each 1s. 6d. net.

CONTENTS.

	PAGE
Chemical Technology	65
The Golden Bough. By A. E. Crawley	66
Some Physiological Monographs. By W. D. H.	66
Our Bookshelf	67
Letters to the Editor:—	
Practical Mathematics.—Prof. G. H. Bryan , F.R.S.	68
Weather and the Ultra-violet Radiations of the Sun.— L. G. Schultz	68
Antiquity of Neolithic Man.—J. Sinclair	70
The Structure of the Ciliary and Iris Muscles in Birds. —C. J. Bond	71
The Attacks of Birds upon Butterflies.—Prof. E. B. Foulton , F.R.S.	71
A Flower-sanctuary.—Frank H. Perrycoste	71
The Summer of 1912. By Chas. Harding	71
Chiriquian Antiquities. (Illustrated.) By Dr. A. C. Haddon , F.R.S.	73
The British Association at Dundee	73
Section D.—Zoology.—Opening Address by P. Chalmers Mitchell , D.Sc., F.R.S., President of the Section	75
Section E.—Geography.—From the Opening Address by Colonel Sir C. M. Watson , K.C.M.G., C.B., President of the Section	81
Section G.—Opening Address by Prof. Archibald Barr , D.Sc., President of the Section	83
Notes	88
Our Astronomical Column:—	
Gale's Comet, 1912a	92
The Total Solar Eclipse of October 10	92
The Perseid Shower of Meteors	93
The Solar Constant and Climatic Changes	93
The Leeds Astronomical Society	93
The Period and Orbit of a Persei	93
New Rules for Life-saving Appliances in British Ships	93
Atmospheric Pressure and Temperature	94
Plankton Investigations	94
The Place of Mathematics in Engineering Practice. By Sir William H. White , K.C.B., F.R.S.	95
University and Educational Intelligence	96
Societies and Academies	97
Books Received	98