

Botany for Beginners. ERNEST EVANS. London and New York, The Macmillan Company. 1899. Pp. vi + 286.

Magnetism and Electricity for Beginners. H. E. HADLEY. London and New York, The Macmillan Company. 1899. Pp. viii + 327.

Ascidia. W. A. HERDMAN. Liverpool Marine Biology, Memoirs I. Liverpool, T. Dobb & Co. 1899. Pp. v + 52 and 5 plates. 1s. 6d.

Report of Fur Seal Investigation, 1896-1897. Part III. *Special Papers relating to the Fur Seal and to the Natural History of the Pribilof Islands.* DAVID STARR JORDAN. Washington, Government Printing Office. 1899. Pp. xii + 629.

On the Building and Ornamental Stones of Wisconsin. ERNEST ROBERTSON BUCKLEY. Madison, Wis., Published by the State. 1898. Pp. xxvii + 544.

SCIENTIFIC JOURNALS AND ARTICLES.

The Journal of Geology for July-August contains the following articles:

'A new Analcite Rock from Lake Superior,' by A. P. Coleman. On the north shore of Lake Superior in the vicinity of Heron Bay, Dr. Coleman recently discovered a series of dikes, one of which proved to be an analcite rock. It has some peculiarities of texture, contains about 52 per cent. silica, and is related to basic syenites. The name Heronite is suggested. A complete analysis is given.

'Corundiferous Nepheline Syenite from Eastern Ontario,' by A. P. Coleman. Dr. Coleman gives some additional notes and facts about this peculiar rock.

'The Effect of Sea-Barriers upon Ultimate Drainage,' by J. F. Newsom. This very interesting and suggestive paper shows how the barrier beaches and their attendant sounds may, when the coast line is elevated, cause the main artery of the resulting drainage to run parallel with them, and at right angles to the subordinate tributaries.

'Season and Time-elements in Sand-plain formation,' by Myron L. Fuller. From a close study and very ingenious interpretation of the Barrington sand-plain and its attendant clays, on Narragansett Bay, R. I., and with auxiliary inferences about the effects of the seasons on the discharge of a glacier, the author makes a computation of the time required to yield the ob-

served phenomena. The results check up very well with general criteria, and the paper is an interesting attempt to give quantitative definition to otherwise hazy themes.

'Petrographical Province of Essex Co., Mass,' VI., 'General Discussion and Conclusions,' by H. S. Washington. In this the concluding installment of the series of papers contributed by Dr. Washington to recent numbers of the *Journal of Geology*, the author generalizes regarding the peculiar chemical features and mineralogy of the Essex County rocks. He also discusses their bearings on the general question of magmatic differentiation. Dr. Washington concludes that differentiation occurred and that it was laccolithic rather than abysmal.

'A Peculiar Devonian Deposit in Northeastern Illinois,' by Stuart Weller. A small triangular mass of rock containing Devonian fossils has been uncovered in a quarry of Niagara limestone at Elmhurst, Ill. It appears to have been a hole in the limestone when the latter formed the sea bottom in Devonian time, and to have been a resort of fish whose remains have been preserved.

'Descriptions of New Species of *Diplodus* teeth from the Devonian of Northeastern Illinois,' by C. R. Eastman. The paper describes the fish, the discovery of whose remains is detailed in the previous paper.

'*Dipterus* in the American Middle Devonian,' by J. S. Udden. This short paper describes and figures a *Dipterus* tooth recently found in the limestones at Fairport, Muscatine Co., Iowa.

Under the 'Studies for Students,' Stuart Weller gives an excellent sketch of a 'Century's Progress in Paleontology.'

The number closes with editorials and reviews.

THE October number of the *Bulletin of the American Mathematical Society* contains a Report of the recent Summer Meeting of the Society, by the Acting Secretary, Professor Thomas F. Holgate; the 'Report on the Recent Progress in the Theory of Linear Groups,' presented before Section A, of the American Association, at the Columbus Meeting, by Professor L. E. Dickson; several 'Shorter Notices'; 'Notes'; and 'New Publications.'

The November number of the *Bulletin* contains a report of the meeting of Section A, of the American Association, by Dr. G. A. Miller; a review of Harkness and Morley's 'Introduction to the Theory of Functions,' by Professor Oskar Bolza; a review of McAulay's 'Octonions,' by Professor A. S. Hathaway; 'Theses in Mathematics at the University of Paris,' a review by Professor E. O. Lovett of five theses, presented to the Faculty of Sciences of the University of Paris, 1897-8; 'Notes'; 'New Publications.'

Bird-Lore for October contains an article by Dr. J. A. Allen on the *American Ornithologists' Union* illustrated by a full page plate showing the twenty-four founders of the Union. It contains portraits of Baird, Robert Ridgway, Elliott Coues, J. A. Allen, C. Hart Merriam, William Brewster and other prominent ornithologists.

It is stated in *Natural Science* that the Quebec government has withdrawn the grant made to defray the cost of publishing the *Canadian Record of Science*. The Natural History Society of Montreal appeals for help to continue the journal.

SOCIETIES AND ACADEMIES.

THE NATIONAL ACADEMY OF SCIENCES.

THE Academy held its autumn session at Columbia University on Tuesday and Wednesday, November 14th and 15th, the following members being in attendance: Cleveland Abbe, George F. Barker, C. E. Beecher, A. Graham Bell, John S. Billings, Henry P. Bowditch, William H. Brewer, George J. Brush, Charles F. Chandler, Cyrus B. Comstock, Edward S. Dana, Samuel F. Emmons, Wolcott Gibbs, Arnold Hague, Charles S. Hastings, Edward S. Holden, Richmond Mayo-Smith, Albert A. Michelson, Simon Newcomb, Charles S. Peirce, Frederick W. Putnam, T. W. Richards, Ogden N. Rood, A. E. Verrill, Charles D. Walcott, E. B. Wilson, Horatio C. Wood, Robert S. Woodward and Arthur W. Wright.

At the business session Professor H. P. Bowditch presented the report of the delegates to the Wiesbaden Congress to consider the establishment of an International Scientific Association.

The scientific program was as follows:

Variations in Normal Color Vision, by Ogden N. Rood.

The Time of Perception as a Measure of Difference in Intensity; Relations of Time and Space in Vision (by invitation), by J. McKeen Cattell.

The Electro-chemical Equivalents of Copper and Silver, by Theodore William Richards.

Recent Results of the Henry Draper Memorial, by Edward C. Pickering. Read by Professor G. F. Barker.

The Statical Properties of the Atmosphere, by R. S. Woodward.

The Hydrogen Vacua of Dewar, by George F. Barker.

A Direct Proof of the Effect on the Eulerian Cycle of an Inequality in the Equatorial Moments of Inertia of the Earth, by R. S. Woodward.

The Definition of Continuity (by title); Topical Geometry, in General (by title): The Map-coloring Problem, by Charles S. Peirce.

Memoir of W. A. Rogers as a Physicist (by title), by E. W. Morley.

BIOLOGICAL SOCIETY OF WASHINGTON, 311TH MEETING, SATURDAY, NOVEMBER 4TH.

DR. L. O. HOWARD, under the title 'Preliminary Notice of an Investigation of the Insect Fauna of Human Excrement,' exhibited a series of dipterous insects reared from human excrement, and stated that having been interested in the published accounts in the medical journals of the autumn of 1898 of the supposed carriage of typhoid germs by flies in army camps, and realizing that no careful investigation of the insect fauna of human excrement had been made by entomologists, he had begun such an investigation in January, 1899. During the year many thousands of specimens of insects had been reared from fecal matter, and had been collected in privies and on excreta in the field, largely in the vicinity of Washington, but also in other parts of the country at different points, from Porto Rico to the State of Washington. Up to the present time, 138 distinct species of insects had been determined to frequent human excrement, including 77 distinct species of *Diptera*,