

granulated gneiss, in some places impacted together with green sandstone into a tolerably dense granitic breccia. At some points the kryolite is found in direct contact with the granite, at others pegmatite is interposed between the two, while here and there this mineral is embedded in a granitic ivigitite.

Great interest attaches to Dr. Holst's observations on the nature and appearance of the so-called "kryokonite," in regard to whose origin the most opposite views have been maintained. According to the writer, who mainly agrees with the opinions held by Danish geologists, this substance is nothing more nor less than moraine mud; in support of which view he gives the result of the careful analyses made, independently of one another, by Profs. Lassaulx, Zirkel, and Svedmark, who agree in maintaining that kryokonite contains nothing but the ordinary constituents of the native rocks. The evidence supplied by these and other carefully-conducted microscopical investigations is, it would appear, so conclusive as to the true constituents of all kryokonites, that it has considerably modified the views once held by Baron Nordenskjöld and others, who at one time maintained the cosmic origin of these bodies. In point of fact, Dr. Holst's observations of this substance, of which he collected various specimens between Kipissako, in  $61^{\circ}$  N. lat., and Illuliakik,  $65^{\circ} 25'$  N. lat., seem to show that the kryokonite of Greenland differs in no way in its nature from the loess of Europe, of which it may be considered as the Arctic analogue.

During his four months' stay in Greenland Dr. Holst visited various native settlements, and his descriptions of the numerous difficulties he encountered in securing boats and guides in the face of the Greenlander's habitual slowness and vacillation are not without interest, but the great value of his narrative depends upon the care and clearness with which he has recorded the results of his scientific investigations. In these particulars, indeed, geologists will find that he has ably fulfilled the purposes of his expedition, and there can be no doubt that the results of his diligent study of the various processes by which glacial action is manifested, and the effects which it produces, will prove of the greatest use in contributing new materials towards the interpretation of various problems connected with the Ice Age in Europe.

A chart of South Greenland, drawn by C. J. Kjellström, on which the inland ice-beds are marked in green and the habitable land in white, enables the reader to follow the track of coast explored by the writer between Holstenborg, in  $66^{\circ} 50'$ , and Kipissako, in  $61^{\circ}$  N. lat.

*The Handy Natural History.* By J. G. Wood, Author of "Homes without Hands." With 226 Engravings. (London: Religious Tract Society, 1886.)

MR. Wood is so well and so widely known for his many popular books on natural history, that the present one is sure to be welcomed by a large number of readers. The illustrations as a rule are most excellent, and care has been taken to make the text as simple as possible for even juvenile readers. The chapter on the monkey tribe is one of the longest and most interesting in the book. Mr. Wood is very careful to state in his first page that between the lower animals and man there is a great gulf fixed which neither can pass. Mr. Wood does not seem to see that the question which has been widely ventilated of late years is not whether there is a great gulf now, but whether there was originally any gulf at all. It is not necessary that this question should be discussed in a book intended chiefly for juvenile readers; but in the absence of a discussion, the statement to which we refer is one which had better not have been made.

There is no index to the book, but at the beginning of it an alphabetical list of animals mentioned is given, which practically serves the purpose of an index. The

number of animals mentioned may be gathered from the fact that the list occupies seven pages of closely-printed type in three columns.

*Hand-book of the British Flora.* By George Bentham, F.R.S. Fifth Edition. Revised by Sir J. D. Hooker, F.R.S. (London: L. Reeve and Co., 1887.)

In the preface to the first edition of this book the author explained that he had often been asked to recommend a work which should enable persons having no previous knowledge of botany to name the wild flowers they might gather in their country rambles. His object in writing his "Hand-book" was simply to meet this demand, and experience has shown that it is well adapted for its purpose. Sir Joseph Hooker, we need hardly say, has revised his late friend's work with perfect tact and judgment, adding considerably to its value by bringing it into accordance with the latest knowledge, without making any essential changes. Mr. Bentham held that previous writers on our indigenous flora had exaggerated the number of distinct species. His opinions on this subject, Sir Joseph Hooker thinks, should not be dismissed hastily, since they were the views "of a great master of systematic and descriptive botany who had collected and studied a large proportion of the prevalent forms of British plants in a living state, not only in our three kingdoms, but in France, Scandinavia, Russia, Germany, Switzerland, and Turkey."

*The Zoological Record for 1885.* Being Vol. XXII. of the Record of Zoological Literature. Edited by Jeffrey Bell, M.A., &c. (London: John Van Voorst, 1886.)

BEFORE the close of 1886 the record of zoological literature for the year 1885 was in the hands of those interested in zoology, and the editor is to be warmly congratulated on this result. The difficulties in the way of such a result are very great; on the present occasion they have been overcome, and we confidently trust the same may be the case for the future. The recorders have accomplished much, but they would be able to do more if the writers of scientific memoirs would assist in so desirable a cause and promptly send to the editor copies of their writings when first issued from the press. All of the recorders seem to have done their share of the work with care and discretion, though to some the lion's share has fallen; the largest contributor being Dr. Sharp, who records all the Insecta with the exception of the Neuroptera and the Orthoptera, which latter groups are recorded by Mr. McLachlan. The large group for so many years recorded by Dr. von Martens is now divided between Prof. W. A. Herdman and Messrs. W. E. Hoyle and G. R. Vine. Dr. P. Bertkau records the Arachnida, including the new species and genera for 1883 and 1884. Numerous corrections and additions have been made in the list of works consulted, and this list now forms a very useful work of reference to the scientific publications of the world. To the records of the Mammalia and the Birds short introductory paragraphs are added, a practice which we would suggest to the other recorders. It is very expedient that they should follow this example, for, short though these paragraphs are, yet in them the reader gets some hint of what has been done in the group for the year. The Zoological Record Association is again able to record grants of 100*l.* each from the Government Grant Fund and the British Association, and one of 10*l.* from the Royal Irish Academy. Although these money grants are extremely well disposed of, we very much regret that so valuable and essential a publication should be to a large extent dependent upon them, and we would fain hope to see the list of subscribers greatly increased.